

# MANUFACTURERS' RECORD

A WEEKLY SOUTHERN INDUSTRIAL  
RAILROAD AND FINANCIAL NEWSPAPER.

## BALANCING SECTIONAL INTERESTS.

An equilibrium of interests will soon be established between North and South, and the two sections can never again drift apart by any chance of which we are now able to conceive. The establishment and acclimation of the cotton-spinning and cotton-weaving industry in the Southern States directly tributary to the cotton field is a development which is going on under our own eyes swiftly and surely. While the industry in the old New England centres is suffering sorely, the Southern mills are prospering wherever there is any pretence to good business management. Old mills are expanding, and new mills are being built, the productive capacity all the while increasing, while there is unceasing activity in the search for new markets.—Philadelphia Manufacturer.

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VOL. XXXIII  
No. 12.

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Baltimore, April 15, 1898.

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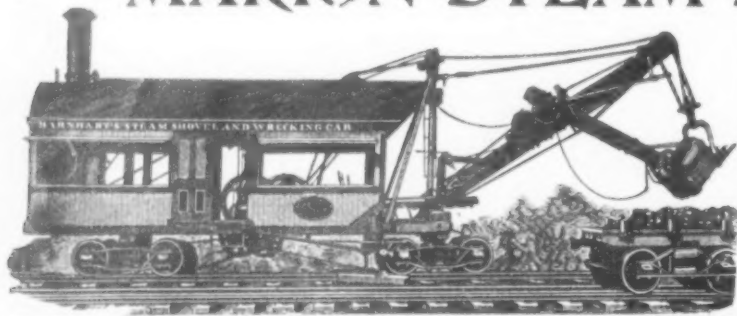
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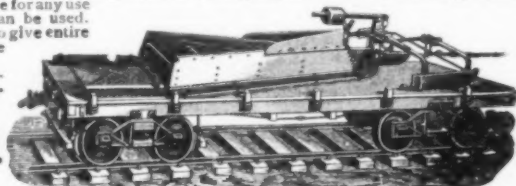


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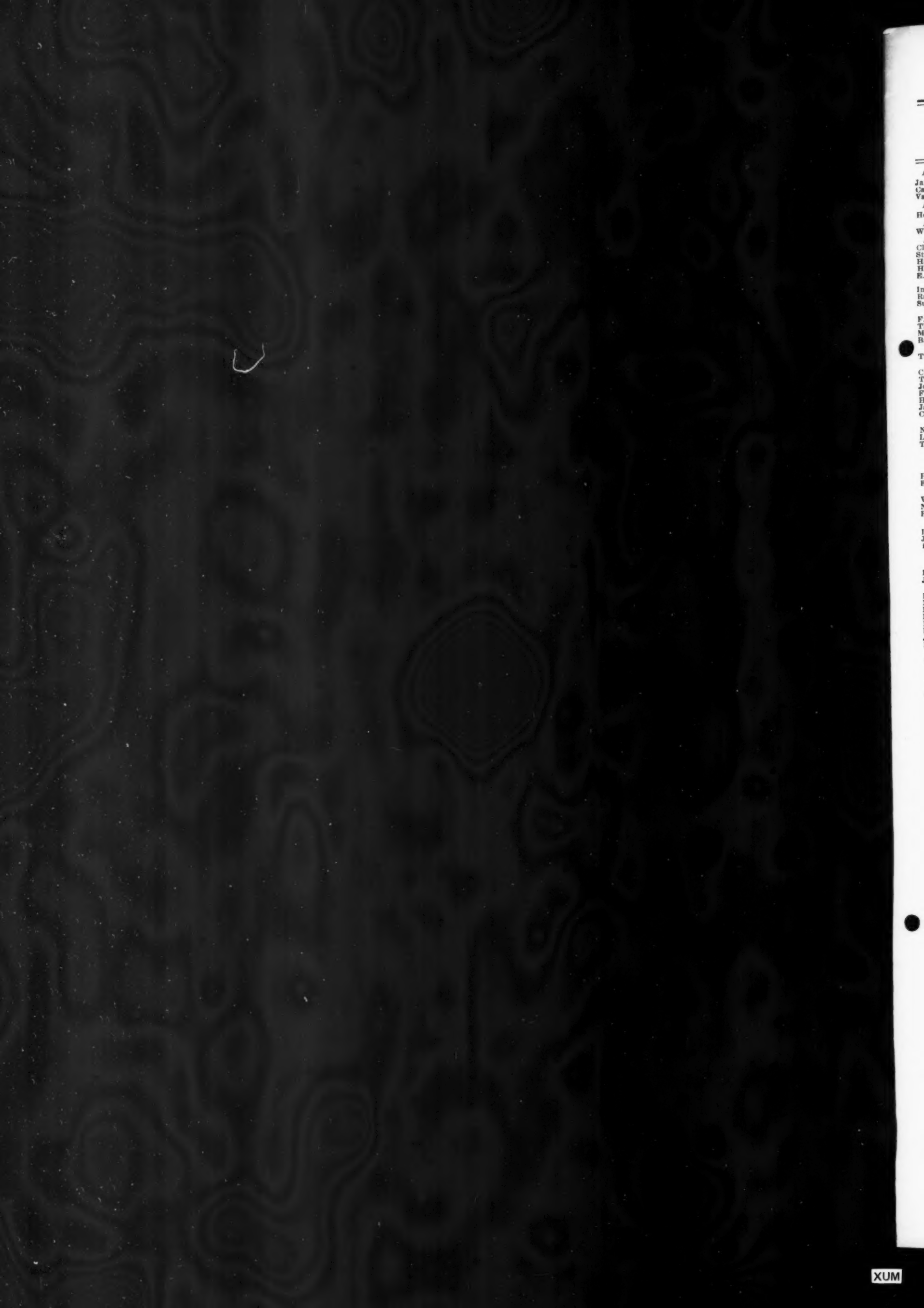
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**Agricultural Implements.**

Hench & Dromgold, York, Pa.

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Clayton Air Compressor Works, New York.  
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[See Well Tools and Supplies.]

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[See Woodworking Mch.]

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[See Boilers.]

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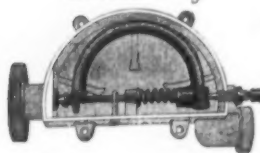
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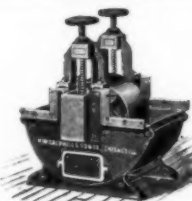


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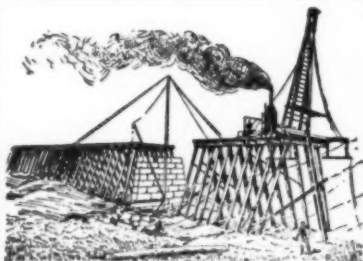
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Roanoke Nav. & Wat. Pow. Co., Weldon, N. C.
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Lane Mfg. Co., Montpelier, Vt.  
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S. Morgan Smith Co., York, Pa.
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R. D. Wood & Co., Philadelphia, Pa.
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Jackson Manufacturing Co., Harrisburg, Pa.  
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The Jeffrey Mfg. Co., Columbus, O.  
Birmingham Boiler Wks., Birmingham, Ala.  
Kilbourne & Jacobs Mfg. Co., Columbus, O.
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The Lunkenheimer Co., Cincinnati, O.
- White Lead.**  
Samuel H. French & Co., Philadelphia, Pa.
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American Ship Wind. Co., Providence, R. I.
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- Wire Rope Thimbles.**  
Jackson Manufacturing Co., Harrisburg, Pa.
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Cordeman, Meyer & Co., Cincinnati, O.  
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Smith-Courtney Co., Richmond, Va.  
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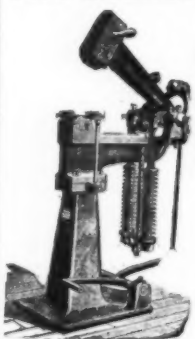
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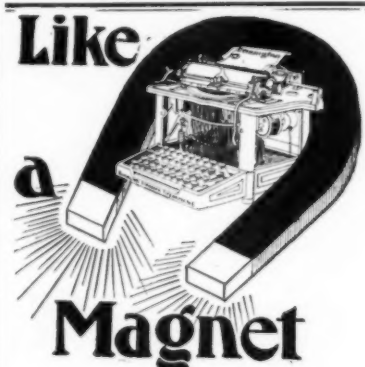


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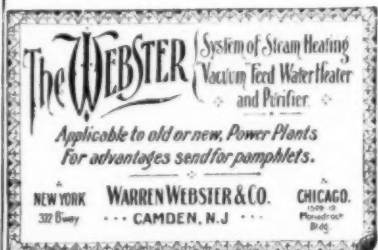


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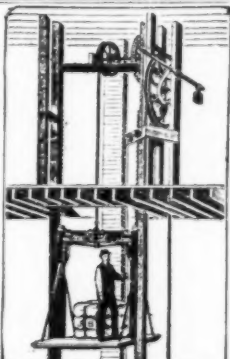


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A Perfect Self-Locking Rope  
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Runs as freely as an ordinary  
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Locks instantly and does not  
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Cannot stick nor jam when  
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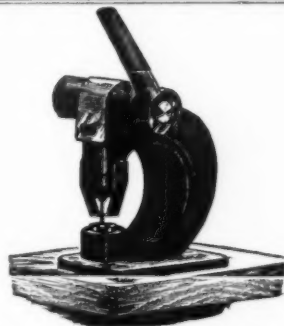
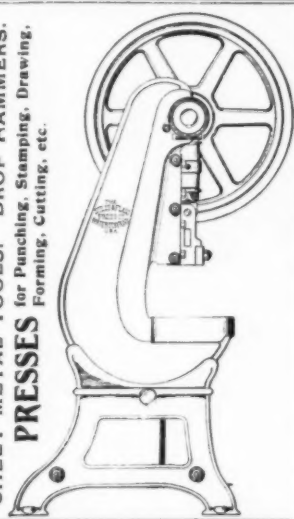


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Has no Pumps to get  
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SHEET METAL TOOLS. DROP HAMMERS.  
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Special Machines Made to Order.  
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We make three sizes  
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Has no pumps or  
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plest in construc-  
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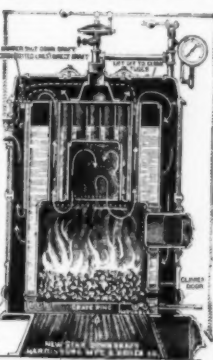
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Work; Shafting, Pulleys, Gearing, Boxes,  
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Cast every day; work 180 hands.  
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For STEAM  
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ITS STRONG POINTS  
Cleanliness,  
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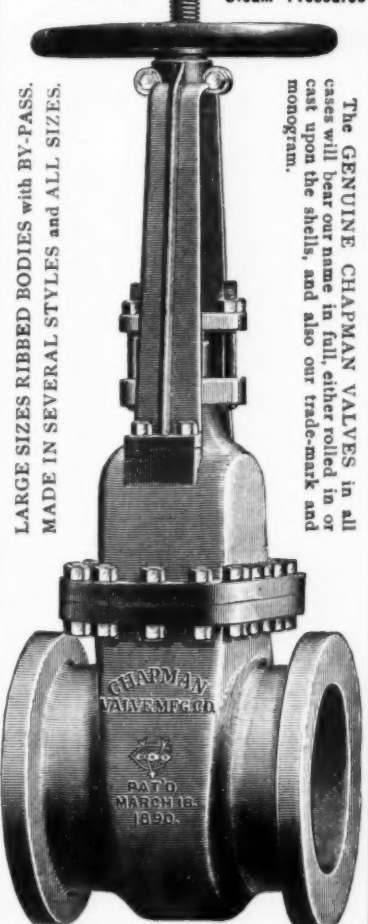
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Removable  
Bronze Seat  
For Very High  
Steam Pressures



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MADE IN SEVERAL STYLES and ALL SIZES.

The GENUINE CHAPMAN VALVES in all  
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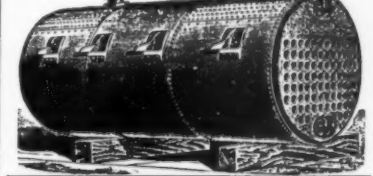
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ESTIMATES FURNISHED ON  
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Builders of Stand Pipes, Tanks, Stacks,  
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Boxes to stick or leak.

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Long or Short,  
according to the  
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protect these vital  
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perfectly lubricated,  
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from friction. Nearly  
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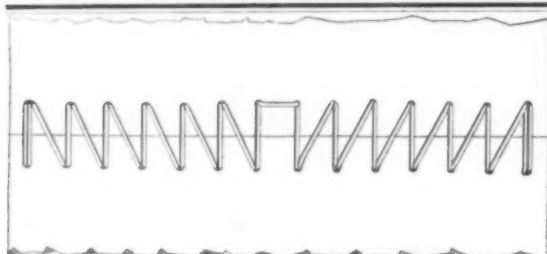
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These appliances  
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features for burn-  
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the Grate alone stands unequal-  
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Buckets Rigidly Attached to Chains.  
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**EXTRA**  
**BELT.**

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 from which the shoulders and flanks  
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Especially adapted for Main Drivers, Saw Mills, Cotton Gins, Cotton Presses, and for all places where belts are subjected to moisture or atmospheric changes, the "CANDY" stands paramount.

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For Main Driving and Work of a Heavy Nature.

SOLE MANUFACTURERS,

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Send for Price Lists and Samples.

Positively Unequalled for Strength  
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STITCHED CANVAS

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Specially suited and the BEST BELT  
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Fully Guaranteed in Every Respect.

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Original Manufacturers of

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BELTING, HOSE, PACKING,  
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SATISFACTORY IN QUALITY AND PRICE.

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"OUR NAME AND BRAND A GUARANTEE OF QUALITY."

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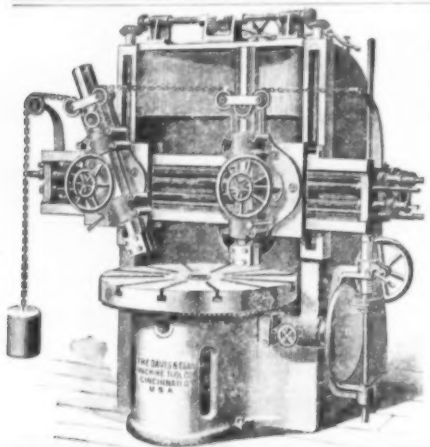


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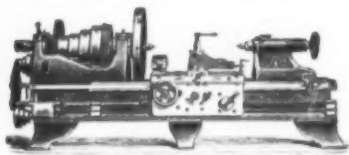
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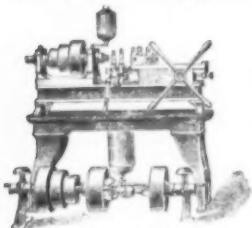
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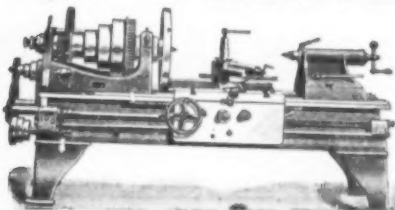
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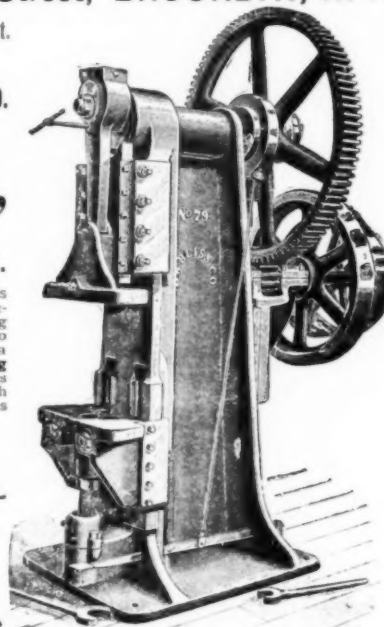
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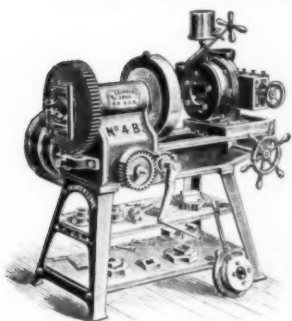
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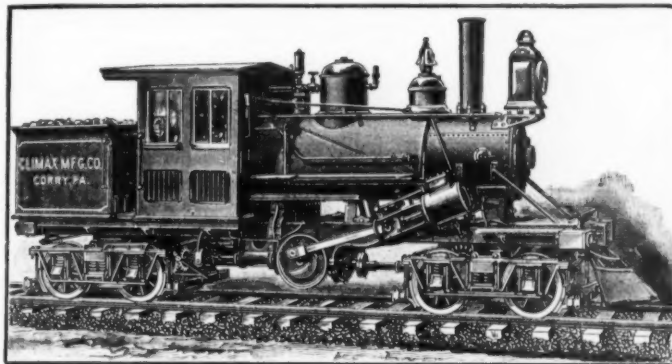
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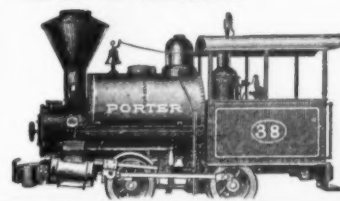
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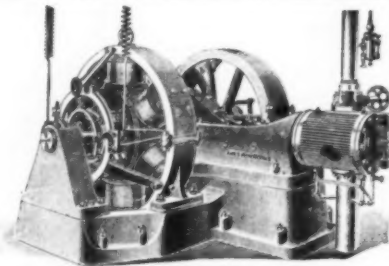


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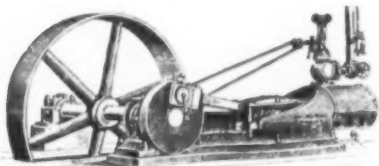
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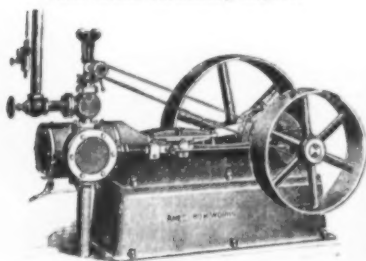
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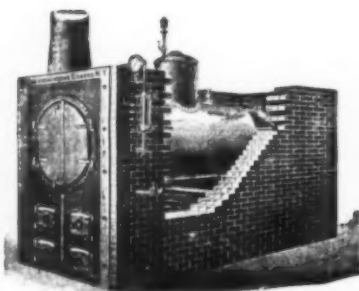
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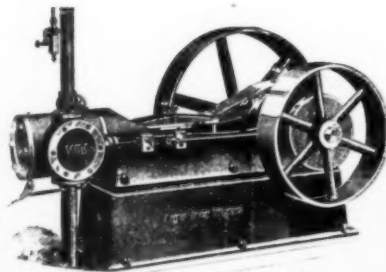
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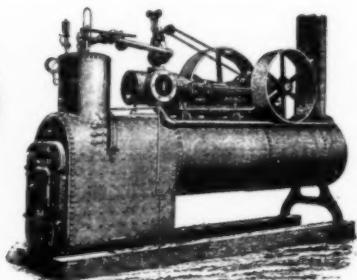
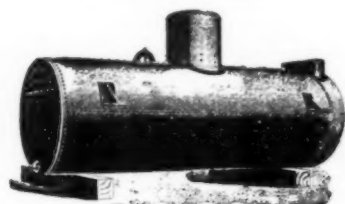
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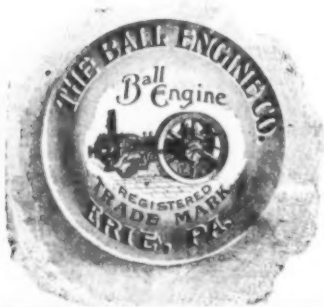
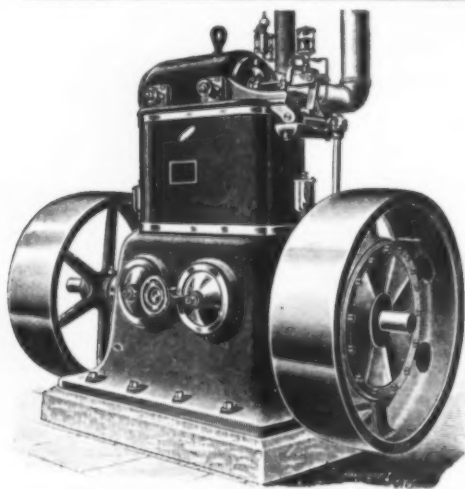
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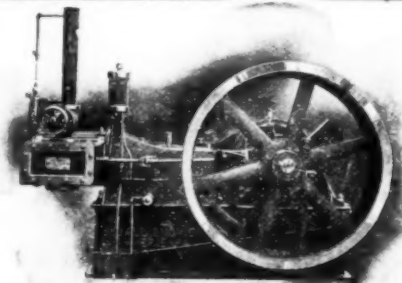
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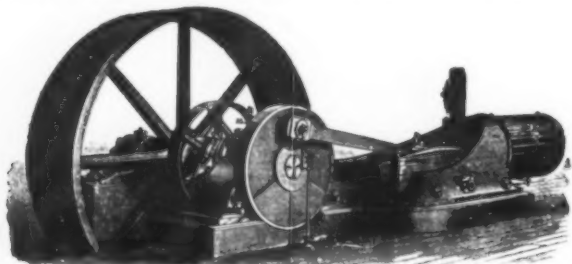
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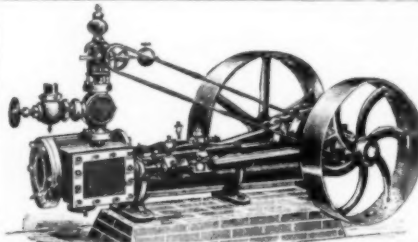
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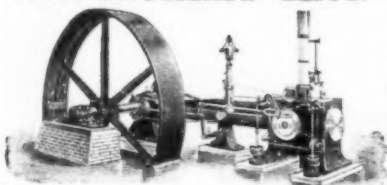
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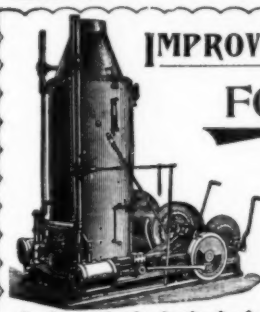
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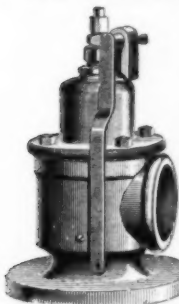
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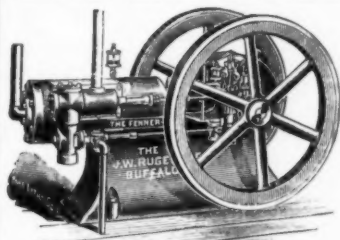
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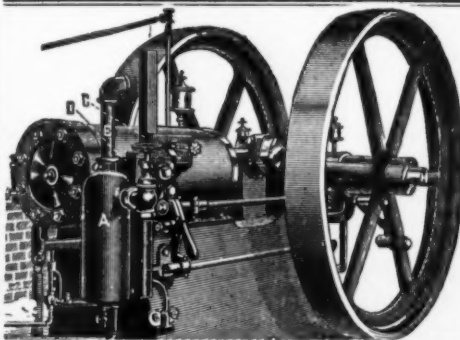
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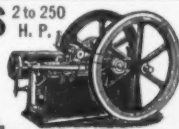
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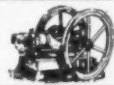
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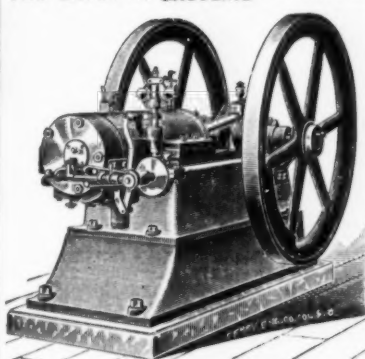


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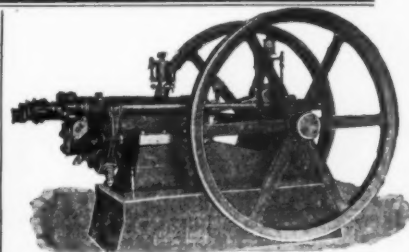
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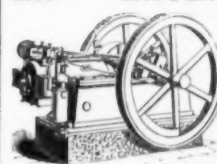
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**The MIAMI,** Uses any kind of Gas or Gasoline.

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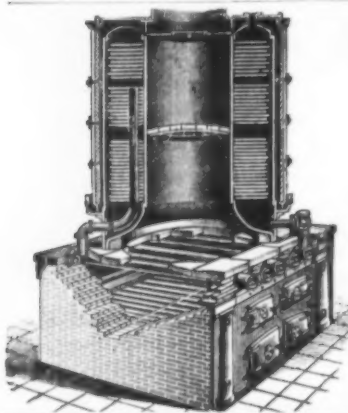


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Patents 519,015-542,674.

Economizes space, fuel, maintenance and first cost to a greater degree than any other boiler.

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Horse Power units of 250, 200, 150, 100 and 50.

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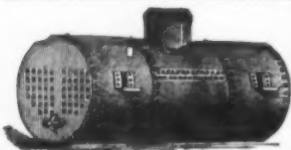
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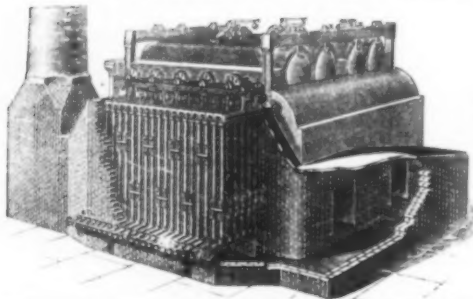
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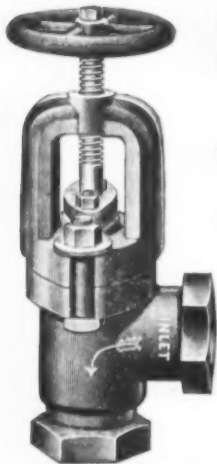


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SCREWED AND FLANGED.

Suitable for Extreme High Steam Pressure up to 250 pounds.

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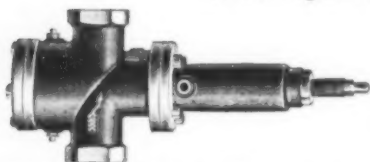
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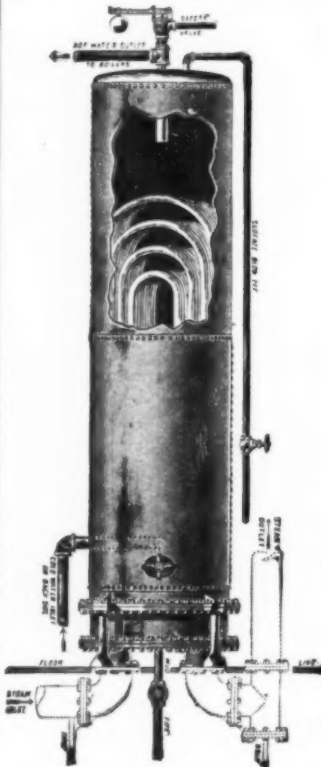
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PROVIDED WITH U-SHAPED TUBES.

It Never Leaks.

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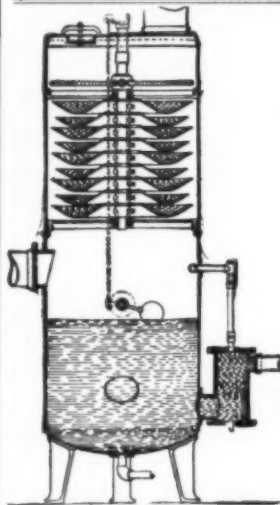
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Open and Closed Types. Also Heaters and Receivers. Send for illustrated catalogue.

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WORKS AT NEWPORT NEWS, VA.  
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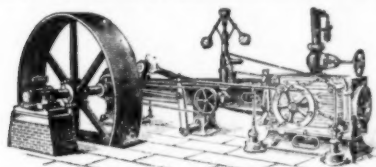
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SIMPLE, COMPOUND AND CONDENSING,  
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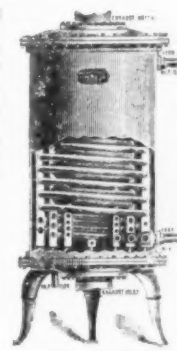
From 50 to 1000 Horse-power.

THE ENGINE for Cotton Mills and Large  
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Also full line of Engines, Boilers, Iron and  
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No Joints to Leak,  
No Back Pressure Possible,  
No Chance for Grease in Boiler.



Economy of  
Coal, Space and Price.

THE NATIONAL.

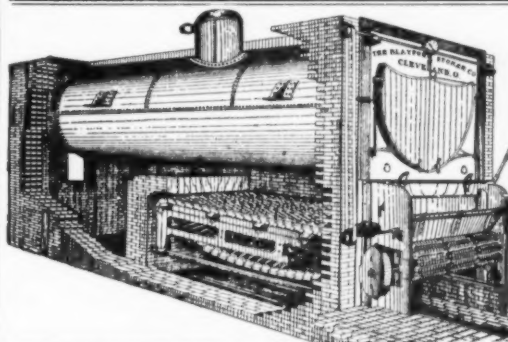
That Delivers Water at 212° F.

800,000 H. P. in Daily Use.

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97 Lloyd St., NEW HAVEN, CONN.



## The Playford Mechanical Stoker

GUARANTEED TO

Abolish smoke, to increase  
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fuel.

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The Great Money and Labor Saver. WILKINSON MFG. CO., 678 Bourse Bld'g, Phila. or Bridgeport, Pa.

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## Manufacturers of Ice Making and Refrigerating Machinery

FOR ALL PURPOSES.

We make Ice Machines from 1½ tons up.

Full information concerning our latest improved  
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Refrigerating Machines from 2 tons up.

We also make Steam Engines, Boilers and Complete  
Power Plants, Castings, Stacks, Tanks, Stand  
Pipes and General Wrought Iron Work.

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## INVEST IN Charleston, SOUTH CAROLINA.

This is a good time to start.

Room and work for

### \$100,000,000

Jetties completed by U. S. Government give channel 26 feet deep to the ocean. Harbor large and deep enough to float the combined navies of the world.

PERFECT CLIMATE.  
GOOD HEALTH.  
PURE ARTESIAN WATER SUPPLY.  
CHEAP ELECTRIC POWER.  
CHEAP TRANSPORTATION.

by rail and water.

Charleston has in its vicinity the most successful market farms in the United States, annual shipments from which amount to more than \$2,500,000.

New manufacturing enterprises exempt from municipal taxation for five years.

### NEARLY \$10,000,000

now invested in manufactures as follows:

Class.	No.	Hands employed	Capital invested	Annual product
Bag factories.....	2	55	150,000	175,000
Barrel factories.....	1	325	300,000	350,000
Basket and willow.....	1	125	225,000	150,000
Broom factories.....	2	13	10,000	25,000
Breweries.....	1	250	75,000	125,000
Carriage & wagon wks.....	1	100	107,000	300,000
Candy factories.....	1	60	100,000	100,000
Cider and vinegar.....	6	100	50,000	100,000
Cigar factories.....	3	15	15,000	35,000
Cotton & wool pick'g.....	1	645	600,000	262,000
Cotton & wool gins.....	1	15	10,000	30,000
Envelopes & box facs.....	4	20	10,000	25,000
Fertilizer works.....	12	1,400	5,350,000	700,000
Flour and grain mills.....	8	275	250,000	300,000
Foundries & iron wks.....	3	200	75,000	100,000
Ice factories.....	25	180	335,000	450,000
Job printing and.....	1	90	24,000	40,000
Knitting factories.....	1	60	40,000	150,000
Marble & granite wks.....	5	35	27,000	75,000
Mattress factories.....	2	90	60,000	250,000
Men's clothing.....	11	5	20,000	325,000
Oil refineries.....	1	179	75,000	150,000
Proprietary estab'ls.....	25	130	400,000	1,000,000
Rice mills.....	2	30	60,000	150,000
Saddlery & harness.....	9	25	40,000	70,000
Sash & blind factories.....	4	320	300,000	850,000
Saw and lumber mills.....	28	3	70	175,000
Ship and boat yards.....	3	45	25,000	100,000
Shoe factories.....	1	15	15,000	60,000
Soap and candle facs.....	22	150	70,000	650,000
Soda water, etc.....	3	150	100,000	175,000
Underwear factories.....	1	150	100,000	175,000
<b>Totals.....</b>	<b>190</b>	<b>5,677</b>	<b>\$9,440,000</b>	<b>\$14,415,000</b>

For any information address

BUREAU OF FREIGHT  
AND TRANSPORTATION,

CHARLESTON, S. C.

## Don't be misled

pumps, drainage pumps, and others too numerous to mention, all driven electrically. If you are in need of anything in the way of electric pumping machinery, write us.

into believing that Henry R. Worthington build nothing but steam pumps. Our electric pump business is larger than any other manufacturer's. We make vacuum pumps, fire pumps, hydraulic elevator pumps, mine pumps, marine pumps, air pumps, boiler feed pumps, brewery

HENRY R. WORTHINGTON, New York.

# SAVE HALF YOUR POWER

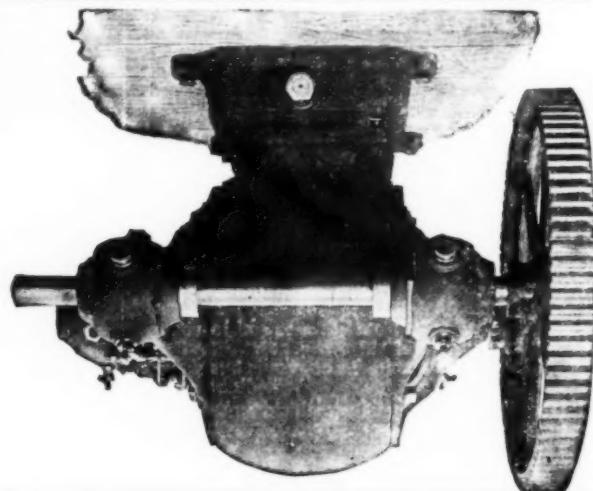
—AND—

## 20 Per Cent. of Your Labor.

If this interests you, send for particulars of our POWER and LABOR SAVING DEVICES by which we operate your machines WITHOUT SHAFTING or BELTS.

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## ROLLER FLOUR MILLS

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GALVANIZED IRON.

We never have stenciled an order of galvanized iron false to its gauge. Such orders go to cheap makers, generally, of course.

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### Successors to Shepard Hardware Co. of Buffalo, N. Y.

In Blind, Shutter and Gate Hinges, Gate Latches, Frame Axle Pulleys, No. 25 Niagara, No. 26 Star, No. 30 IXL, No. 60 Square End, No. 35 Acme solid case with markers, and the Gem Machine Pulley from 1½ in. to 2½ in.

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Stenger's Patent Self-Locking "Noiseless Blind Hinge," Christman's Shutter Lock and Bower, Furniture Casters, Shelf Brackets Plain and Rosette, Plumbers Brackets Nickel Plated and Plain, Hay Fork Pulleys, Well Wheels, Grindstone Fixtures, Nail Hammers, Claw and Shingling Hatchets, Toy Hammers and Hatchets, Toy Sad Irons and Stands, Jackstones in Boxes or Bulk, &c.

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BEVEL PACKING RING

ABSOLUTELY STEAM TIGHT.

NO SPRINGS.

SELF-SUPPORTING. SELF-ADJUSTING.

15,000 Valves in use on Locomotives, Stationary and Marine Engines.

Descriptive Catalogue Free.

AMERICAN BALANCE SLIDE VALVE CO.,  
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### "SAMSON" STEEL BELT HOOK.

SAMPLE SENT FREE.

For all kinds of Belts—leather, cotton or rubber. Will neither cut nor pull out. FLEXIBLE, SMOOTH and NOISELESS RUNNING.

THE BEST FASTENER FOR OLD BELTS.

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Compressed Air is the life of the Holland Submarine Torpedo Boat. By an INGERSOLL SERGEANT Class "E" single acting Compound Air Compressor, air is compressed up to 2500 pounds pressure, and is used for Emptying the Water Ballast Tanks. Driving the Horizontal Steering Engines. Driving the Engines controlling the Diving Gear. Ventilating. Respiration. And other purposes. The details of which have startled the world.

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# MANUFACTURERS' RECORD.

A WEEKLY SOUTHERN INDUSTRIAL, RAILROAD AND FINANCIAL NEWSPAPER.

VOL. XXXIII. No. 12.  
WEEKLY.

BALTIMORE, APRIL 15, 1898.

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## Manufacturers' Record.

PUBLISHED EVERY FRIDAY BY THE  
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RICHARD H. EDMONDS, President.

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BALTIMORE.

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BALTIMORE, APRIL 15, 1898.

### Would Paint the Lily.

If the South is to keep pace with the North she will learn, as surely as there is a sky over her, that she must reach out for something higher and better than material prosperity.

This sentence, in an editorial of the Fall River Daily Herald, indicates that the good judgment which usually dictates its editorials may be liable to fail at times. If there is any part of the country which has been less infused by the materialistic tendency of the age than the South, we have failed to observe it. The prosperity of the North, magnificent in its proportions, is not an object of envy on the part of the South, but rather an incentive to greater endeavor to approach it. Yet it cannot be doubted that in attaining such prosperity the North has lost much of the idealistic spirit which works for the uplifting of the republic. In the alertness and eagerness to take advantage of every opportunity for advancement, if not to create such an opportunity, a man frequently impairs the finer traits which are supposed to represent the sum of the influences of real civilization. As with the individual, so it is with the mass.

In former years the social condition of the South was such as to discourage undertakings which have contributed to such an extent to the material prosperity of the rest of the country. That condition has passed. The industrial and commercial advance of the South during the past fifteen or twenty years is one of the wonders of the country. It has been accompanied, it is true, in some instances by a neglect of the ideal, but the general tone of the men representative of the best interests of the South remains the same as ever. The bane of political excitement may again and again threaten the demoralization of public sentiment temporarily, but as long as there is an influential minority true to the honorable traditions of the South, that section may expect to advance not only in material prosperity, but to continue to maintain the principles of something higher and better.

### Turn of the Tide.

Two conventions are to be held next month in the South of more than usual significance. Their intent is revealed in the phrases "For Kentucky's Good" and "Patriotic Appeal to Tennesseans" as headlines to newspaper articles relating to them. The Louisville Commercial Club has been largely instrumental in working up interest in the Kentucky convention, and from its published programme it is seen that the discussion will cover the State's geographical advantages and its agricultural and industrial opportunities, and will seek to show how capital may be best attracted to the State and most profitably employed there, the best method of encouraging desirable immigration, the uses and abuses of corporations, how best to employ railroads—the greatest source of development, and will deal also with land titles, good roads, commercial laws and the delays in cost of administration of justice. Among the topics for the Tennessee convention are tax laws, the raw material in the State for manufacturing, agriculture, labor and its influence, relation of banks to the development of industries, the prevention of the flow of capital from Tennessee and the encouragement of its location in the State.

In the admirable address issued by the executive committee of the Tennessee convention, of which Col. J. B. Kilbrew, of Nashville, is chairman, are some statements which may be profitably considered in all parts of the South. The point is made that the manufacturing interests of the State are not being developed at a rate corresponding to that which prevails in other States having fewer natural advantages, and in discussing the causes of this condition the following statement is made:

The principal one, in our judgment, is the want of encouragement given to manufacturing interests by our laws. These laws have been so shaped as not only to deter outside capital from investing in manufactures for which we have abundant raw material, but our own people have been afraid to venture into such enterprises, with the menace of double taxation that hung, like the sword of Damocles, over every incorporated industrial establishment in the State. Until recently it was possible, under unwise assessment laws, to tax the plant of a factory, to tax the capital stock and to lay a privilege tax upon the same industry. Our laws are so obscure even now that their ambiguity and double construction deter capital from engaging in manufactures. Our own people prefer to put their savings in directions which they consider safer. This timidity is due in part to our former laws, now happily repealed, which permitted double taxation. The bad odor of those laws, however, still remains and hinders our progress. Though they have been repealed, manufacturing establishments are yet slugged out as one of the special objects for taxation, with elaborate and complicated provisions for taxing them; whereas, in other Southern States manufactures are taxed like real estate or other property, and are not especially mentioned in any manner in the tax laws. Our laws taxing corporations create a feeling of disquietude and uncertainty in the mind of the investor, and leave the impression that unfavorable and unfriendly construction of the existing tax laws is possible. Manufacturing capital, if

in any way liable to excessive taxation, will seek other channels or other localities.

The point is also raised that in many portions of the State there is a pronounced hostility to all corporations. The remedies suggested are the removal of impediments to the establishment of small factories and the dissipation of prejudice against aggregate capital. The legislature is urged to make the investment by combined capital as safe and as free from unjust taxation as the capital invested by individuals, and to insure such a result wisdom and business sense in the lawmakers are demanded, resting upon a healthier public sentiment, that shall secure for corporations the same consideration and justice in the courts as are extended to individuals.

The whole tone of this address has a familiar air to constant readers of the Manufacturers' Record. The objects to be obtained have been advocated for many years by us, and we have been unceasing in proclaiming the causes operating against their attainment and in urging a removal of those causes. At times the Manufacturers' Record has stood almost alone in this propaganda, and has been subjected to all kinds of irrational attacks. Such antagonisms, however, have not caused it to swerve from its purpose. It knew the South too well to believe that its wisdom, integrity and progressiveness would permit the wiles of the selfish politician to threaten its material interest for any prolonged period. It sees in these State industrial gatherings the fruit of its sustained endeavor, and welcomes them as a possible medium for the overthrow of the demagogue, the curse of any country or of any State.

The Nashville address classes among the potent causes militating against industrial progress the indifference manifested by politicians in the matter until many of the rising generation have come to look upon politics as a field only for opportunities to enjoy the emoluments of office. It is claimed also that a class has been educated to regard everything popular as right, and hence the material interests have come to be subordinated to questions of political supremacy and of personal politics. In this situation is the stronghold of the demagogue. It must be destroyed before he can be deprived of the means not only of checking the industrial, commercial and agricultural growth of the State, but also of actually causing it to decline. Too frequently in the past he has been able to transform a gathering designed for business strictly into a campaign medium. If the coming conventions are successful in suppressing him, they will do much toward the weakening of his influence, and will prepare the way for his retirement. In this arduous task not only members of the convention, but every man interested in the progress of his State and section, may depend upon the co-operation of the Manufacturers' Record as heretofore.

### Breadstuff Exports South.

The latest bulletin of the Treasury Department shows that the Southern ports are maintaining their position as exporters of breadstuffs. During the nine months ended March 31 the value of breadstuff exports from all ports was \$229,893,138, an increase of \$76,087,449 over the nine months ended March 31, 1897. This is equal to 49 per cent. To this increase four Southern ports—Baltimore, Newport News, New Orleans and Galveston—contributed \$37,177,757, or 48 per cent. of the total. The relative increases at different ports may be better noted in the following table:

Ports.	Gain.	Gain per cent.
Baltimore .....	\$15,292,616	62
Newport News.....	4,741,089	51
Galveston .....	7,041,402	167
New Orleans.....	10,102,650	91
Boston .....	1,000,654	14
New York.....	19,694,037	51
Philadelphia .....	8,771,724	109
Puget Sound.....	3,960,879	122

The exports at Baltimore were more than twice those at Philadelphia, and more than those of Philadelphia, Boston and Puget Sound combined. New Orleans exported more than either Boston or Philadelphia, and its exports, with those of Baltimore, exceed in value those of New York by more than \$2,000,000. It will be noted that the exports from the two Gulf ports mentioned show the largest percentage of increase of those at Southern ports, and New Orleans the largest percentage of increase in the country. These percentages, marking the tendency of the movement of cereals bound for foreign countries, indicate that it has become a permanent feature in the Southern export business. The maintenance of its importance depends largely upon the energies of the Southern ports themselves.

### Southern-Built Vessels.

The purchase by the government to augment the navy of five large vessels built at Newport News, Va., to which reference is made in another column, is a marked recognition of the work done at the Virginia plant and a strong encouragement of efforts to improve the position of the South as a shipbuilder. We have urged from time to time the importance of this industry as an accompaniment of the development of the manufacturing interests and an aid to the expansion of the commerce of the South. At no time have we stated the reasons more clearly than has the Age of Steel in its last issue. Dwelling upon the South's large resources of ore and coal, and of materials auxiliary to the iron industry, and their closeness to outlets of South Atlantic and Gulf ports, it says:

As a corollary of these conditions the shipbuilding industries of the South will become another factor in its rapidly increasing industries. What it can do in this way the shipyards in Virginia are in good evidence. The South has both iron and timber in abundance and every kind of material essential to the shipbuilding industry. In South and Central America and in the Isl-

ands of the Caribbean sea, an immense trade is being built up, which in the course of time and along our zonal lines will develop into an empire of commerce. What is being done at Mobile, Savannah, Pensacola, New Orleans, Galveston, Port Arthur, etc., will be duplicated at other points where conditions are favorable to the access and egress of the merchant marine of all nations. The index-finger of events points in that direction. Everything is favorable to the shipbuilding industries of the South, and in that line of progress, as on the others named, we see the unfolding of the industrial and commercial destiny of the New South.

The absorption into the navy of a large number of vessels built for peaceful purposes will create a demand for other vessels. In the impulse thus given to shipbuilding the South should gain its share of the industry.

#### Southern Coal Output.

A preliminary statement, compiled by E. W. Parker, statistician of the United States Geological Survey, of the total output of coal in the United States for 1897 furnishes a basis for the study of the great advance in that industry in the South. The total output of bituminous coal, with which is included a small amount of anthracite, mined in Virginia and Arkansas, was 146,134,380 short tons of 2000 pounds. There are twenty-nine bituminous coal-producing States, of which eleven are Southern. Of the total there were only six in which the production in 1897 was less than that in the preceding year, and only one of these—Georgia—was in the South. Pennsylvania, of course, led in the production, its output being 37 per cent. of the total; Illinois second; West Virginia third, leading Ohio by nearly 1,250,000 tons; Alabama was fifth, Iowa sixth, Maryland seventh and Indiana eighth.

The following table offers the means of comparing the progress of the South with that of the rest of the country:

	1897.	1896.	1895.
Alabama.	5,893,770	5,748,697	5,693,775
Arkansas.	807,207	675,374	508,322
Georgia.	135,869	238,546	260,008
Kentucky.	3,906,458	3,353,478	3,357,770
Maryland.	4,442,128	4,143,936	3,915,585
Missouri.	2,627,458	2,331,542	2,372,393
N. Carolina.	21,280	7,813	24,900
Tennessee.	2,880,904	2,663,106	2,535,644
Texas.	619,602	544,015	484,959
Virginia.	1,524,956	1,254,723	1,368,324
W. Va.	13,556,978	12,876,296	11,387,961

Total South 36,476,700 33,817,526 32,000,631

Total U. S. 146,134,380 137,569,784 135,051,014

The increased yield in the South in 1897 over 1896 was 2,659,174 tons, equal to 7.8 per cent., and in the rest of the country 5,914,422 tons, or 5.7. West Virginia and Kentucky show the largest actual gain in the South, which advanced much more between 1896 and 1897 than between 1895 and 1896.

The South's gain is more appreciable in comparing the figures for 1887 and 1897, as follows:

	1887.	1897.
Alabama.	1,950,000	5,893,770
Arkansas.	150,000	807,207
Georgia.	313,715	135,869
Kentucky.	1,933,185	3,906,458
Maryland.	3,278,023	4,442,128
Missouri.	3,209,916	2,627,458
North Carolina.	21,280	7,813
Tennessee.	1,900,000	2,880,904
Texas.	75,000	619,602
Virginia.	825,263	1,524,956
West Virginia.	4,836,820	13,556,978

Total South 18,471,922 36,476,700

Total in U. S. 87,887,360 146,134,380

In 1887 the South produced 18,471,922 tons, or 22 per cent. of the total in the country. In ten years it had increased its output 93 per cent., equal to 36,476,700 tons, which was little less than 25 per cent. of the total. The increase in the rest of the country had

been from 69,415,478 to 109,657,680 tons, or 58 per cent. Alabama's gain in ten years was 201 per cent, West Virginia's 180 per cent, and Kentucky's 102 per cent.

These figures are valuable as indicating the growing industrial importance of the South. While many mines there are contributing to the industrial activity elsewhere, the advance from 75,000 to 619,602 tons in Texas, and from 150,000 to 807,207 in Arkansas, together with the comparative figures in other States, shows the growth of enterprises in the South itself, and is the promise of ability to supply fuel for new ones or for the vessels which are to contribute to the extension of Southern commerce.

#### Massachusetts Mill Men.

When cotton manufacturers of Massachusetts undertook four or five months ago to trace to the South the conditions of their business, and under the guise of solicitude for employes gave birth to an agitation for the interference by the general government with the private industrial affairs of Southerners, the Manufacturers' Record intimated that much of the published utterances were for home consumption. That we were not mistaken is shown by the suggestions, in a recent memorial representative of the same manufacturers, that the Massachusetts legislature raise the hours of labor at least to the point where they are in every other New England State, and reduce taxation on manufacturing plants, now much in excess of that in England and in the Southern States.

So the South is not the only region where low wages come into combination with those of Massachusetts, and low wages are, after all, not the only advantage of importance possessed by the South? The Massachusetts men are moving toward the light. If they wish to hasten their steps they should ponder upon these words of the Boston Journal of Commerce:

There are plenty of cotton mills in the South which have not been in operation more than fifteen years that have already changed most of their machinery from what was originally put into their plants. Let an improved machine come upon the market and who is the first to adopt it? It is the Southern manufacturer in most instances. \* \* \* Look at the large amount of money our cotton-machinery builders have spent in the past three or five years improving their machinery, yet with our Northern mills filled with machinery twenty and thirty years old, and some even a great deal more ancient, these shops cannot any of them get work enough to begin to run a full corps of help on full time. We copy a good deal in cotton manufacturing from our English neighbors, yet you do not see English cotton mills, to any extent, trying to use old, antiquated machinery. We do not pose as a prophet, or locate ourselves in public places to act as generals or advisers, but out New England cotton mills, in our opinion, are working against their own interests in not using more modern machinery. It is conservatism run to seed, and no dividends is the inevitable result of a persistent cultivation and perpetuation of such a fatuous policy.

The Baltimore Manufacturers' Record, following the lead apparently of the New York Sun, elaborated a strangely virulent criticism of the peace policy of the New York Evening Post, which incidentally found access to the columns of the News—Galveston News.

The News is entirely incorrect. The Manufacturers' Record has not criticised the "peace policy" of the Post or of any other paper. All too deeply do we realize the horrors of war to favor it, except as a last resort, and for the rampant papers and people that have sought to arouse the war spirit we have no words severe enough to express our

condemnation. The sacrifice of vast business interests that must come with war is of no moment compared with the sacrifice of lives and the desolated homes that it would bring. It is not against its "peace policy" in itself that the Manufacturers' Record has criticised the Evening Post, but against its wholly cold-blooded un-American spirit—a spirit that, instead of calming the country, has had the very opposite effect. In the last campaign the Manufacturers' Record took the ground that the spirit of denunciation of the advocates of free silver, the spirit that called them anarchists and repudiators, was really responsible for much of the spread of the free-silver idea, and the New York Post and a few New York bankers were the leaders in this wholly unjust course. The Post, in pursuing with the same sarcastic bitterness the investigations into the Maine disaster and the proposition to erect a monument to the memory of those who lost their lives through this disaster, has simply intensified the sentiment of those who want war.

As the Galveston News has so thoroughly misstated the position of the Manufacturers' Record, will it, in common fairness, make this correction?

#### A Million-Dollar Telegram.

At the end of a recent week of unprecedented prosperity to the Chesapeake & Ohio Railway, a high-water-mark week in the volume of traffic, signalized by escape from the slightest accident or even the serious delay of a single train, President Ingalls sent out a congratulatory telegram, not to the security-holders, not to the stockholders, not even to the newspapers, but to the rank and file of that loyal industrial army to whose energetic vigilance this gratifying result was due.

"That telegram," said one of the C. & O. freight conductors, whom I happen to know, "will be worth a million dollars to our company."

"Yes," I replied, "since I hear you speak of it as OUR company, I believe it will."

Some months ago in commenting on the singular loyalty that characterizes C. & O. employes, I mentioned their almost affectionate regard for Mr. Ingalls and the fact that he seemed to enjoy their confidence to an extraordinary degree. Any one who travels much over either the C. & O. or the "Big Four," and who takes occasion to talk with the trainmen, will be sure to hear utterances in harmony with this feeling of loyalty, which go to show the existence of a really superb esprit de corps. As Mr. Ingalls is not a particularly affable man, nor what is popularly known as "a good mixer," I confess I have at times wondered how he ever managed to get so strong a hold on the hearts of his subordinates, from the highest to the humblest. That "million-dollar telegram," giving the meed of praise to those who had earned it, explains it all.

It goes without saying that the traveler feels safer on a train manned by men who have at heart the true interest and success of the company—which they call "our company"—a train running on a track kept in order by men ambitious to make good records and encouraged by the certainty that merit will be rewarded every time—I say it goes without saying that the traveler will feel safer on such a train than on one where the employes are racked with discontent or bristling with hostility, as is, alas! the case on so many of our railroads, largely because the magnates are not in sympathy with the men and fail to give them credit according to their merits.

THOMAS P. GRASTY.

#### SOUTHERN SHIPS PREFERRED.

##### The Government Purchases Four Vessels for Its Service Constructed at Newport News.

During the last few weeks the government has bought a number of vessels, as readers of the Manufacturers' Record are aware, for the purpose of strengthening the navy and obtaining ships for carrying supplies, etc. It is a noticeable fact that nearly all of the larger vessels thus far purchased have been built at a Southern shipyard—that at Newport News, Va. The steamship Creole, which has been decided upon by the United States engineers as a repair vessel, was constructed at the point for the Cromwell Line, plying between New York and New Orleans. She is a new vessel, and was built for passenger and freight service between these points. Her length is 270 feet, and her register 4000 tons.

The vessel will be fitted out immediately with the necessary machinery for repairing equipment of warships, and, in fact, will be a huge floating workshop. On account of the weight and power of the apparatus to be installed it is necessary to have a very strongly built hull, and this is one of the reasons why the Creole was selected for the auxiliary fleet, as it is termed. The government has also purchased the steamships El Sol, El Norte, El Rio and El Sud, all of the Morgan Steamship Line, which have been running between New York and New Orleans, carrying freight and passengers. They average about 4000 tons each, and all but the El Sol were constructed at the same yards as the Creole. In fact, they were the first large vessels built at Newport News, and, although the government engineers examined craft in all of the principal ports of the country, they were selected as best adapted for the purposes of the navy. It cannot be said any favoritism has been shown in this respect. Naval experts have been visiting Boston, New York, Philadelphia, Baltimore and other coast cities, and the selections were not made until most of the available vessels were examined.

The El Sol is an iron vessel, registers 3021 tons net, 4532 gross, was built by Wm. Cramp & Sons at Philadelphia in 1890, measures 390 feet 6 inches in length, 46 feet 8 inches in breadth and 24 feet depth of hold. The El Sud is an iron vessel, registers 2901 tons net, 4659 tons gross, measures 380 feet 5 inches in length, 48 feet in breadth and 23 feet 9 inches depth of hold. The El Norte is an iron vessel, registers 2901 tons net, 4659 tons gross, measures 380 feet 5 inches in length and 23 feet 9 inches depth of hold.

These ships are to undergo changes which will convert them into what will be known as auxiliary cruisers. They will be equipped with rifled guns and practically altered into warships. As great strength is required in order to sustain the shock of firing modern ordnance on a vessel, it is evident that the naval experts considered these points especially in the purchase.

While the Newport News plant has been in operation but a few years, it has demonstrated beyond question what can be done in the way of shipbuilding in the South, and emphasizes the necessity of more plants of this kind, either on the South Atlantic or Gulf coast. That such yards can be made profitable is beyond question. In this connection it is interesting to note that the Newport News Company will in all probability secure the contract for two 10,000-ton steamships for the Pacific Mail Co., which, it is understood, this corporation is about to give out.



## THE TEXTILE INDUSTRY.

## Additional Agitation of Massachusetts Manufacturers.

Southern cotton-mill men will be interested in the statements made in a memorial presented to the Massachusetts House of Representatives touching the textile industry in that State. Its signers are T. Jefferson Coolidge, A. G. Pierce, C. L. Lovering, E. C. Clarke, C. A. Coleman, E. S. Draper, Harcourt Amory, T. E. Brayton, Howard Stockton, A. Lowell, G. B. Fabyan, A. S. Covell, A. M. Goodale, H. N. Slater, G. S. Silsbee, C. P. Baker, C. H. Dalton and A. C. Houghton, who contend that the present conditions and prospects of the industry in the State are sufficiently grave to call for an exhaustive study, and continue: "Whether this industry, which, for two generations, has added largely to the wealth and population of the State, has reached the highest point of its expansion, and is hereafter to decline, is today an open question. That its value to the State is now shrinking is beyond a doubt. Whether the shrinkage can be arrested and the process of expansion can be resumed, is still in doubt. The evidence of shrinkage appears in lower earnings of the operatives, lower prices of the products, lower market values of the plants and lower profits.

"These unsatisfactory conditions do not result from causes under the control of the parties immediately engaged in the business. Manufacturers and operatives resist them to their utmost. At no time has the average condition of the machinery been better, or the operatives more skillful, or the quality of the products superior, or the commercial or financial management abler, than they are today. Under the Dingley tariff, labor in cotton mills is fairly well protected against undue foreign competition. The competition comes from other States, where machinery produces more by being run more hours, where wages are lower, and where the taxes and other burdens upon the industry are less.

"Unless this competition can be successfully met, the outlook for the industry in Massachusetts is not encouraging.

"The decay of this industry in Massachusetts means to operatives vastly more than they seem to consider. Some of them will be forced to seek homes in other States, where the situation of labor is less favorable than it is in this Commonwealth; and these States will not be likely to repeat the mistakes in legislation which have proved disastrous here.

"It must be remembered that decay in the cotton industry will affect adversely the prosperity of the whole State.

"In recent years successive legislatures have passed many acts intended for the better protection of operatives in mills from the possibly unwise or unfair policy of the manufacturers. Some of these laws have had the natural effect of checking investments in machinery, restricting the opportunities for employment, diverting capital to other States and helping to build up so sharp a competition outside of Massachusetts that the unfortunate consequences are now too obvious to be longer ignored.

"The diverted capital cannot be recalled. It is permanent loss to the State. If Massachusetts is to continue its present restrictive policy it should do so with a full understanding of the sacrifices involved, both as to capital and labor, and be content to see her early supremacy as a cotton manufacturer continue to decline, while her competitors multiply, or she can face the situation and adapt her policies to meet the necessities of the times.

"Every week adds more than 1000 persons to the population of the State seeking employment, a large proportion of whom are dependent upon the tools and machinery which capital supplies.

"It is not enough for a growing State that its industries be maintained at their existing volume. To stand still while others are growing is to fall behind. Intelligent legislation may foster industries by securing the confidence of capital, to the end that a constantly-increasing population may find correspondingly increasing opportunities to earn a livelihood, and thus add strength to the State.

"If cotton manufacturing in the State becomes unprofitable, one of two things must happen—wages will be reduced, or the business will be abandoned, as has been the case in the iron and glass industries. Either of these consequences would be a great misfortune, which the legislature should, if possible, prevent in the only way in its power:

"First, by raising the hours of labor at least to the point where they are in every other New England State, and, secondly, by reducing the taxation on manufacturing plants, which is now much in excess of that in high-taxed England and in the Southern States. The effective way, in our judgment, would be to take off all taxes on machinery, without increasing those on the real estate used for manufacturing purposes.

"The present situation may present itself to some persons as having no deeper significance than a contest between capital and labor, the outcome of which is to be a triumph of one or the other. If this were the truth there would be no occasion for this communication, and the legislature would have no call to intervene. It is because the difficulty is fundamental and limited to no class of industries in the State that the responsibility in the premises rests upon the representatives of all the people."

## Suggestive Comments.

Regarding the increasing in the hours of labor proposed the Fall River Herald says:

"As might be anticipated, the main contention in the memorial in question is that the competition in other States, where more hours enable the corporations to utilize their machinery to better advantage, is driving the Massachusetts companies to the wall. Now these manufacturers, who are interested on the side of capital, are certainly entitled to a respectful hearing, and it is only fair to assume that they have not been hasty in arriving at conclusions. They have ability, and we believe that some of them, at least, would prefer conditions which would admit of high wages, although there are others who are concerned only regarding the profits. When they reason that they are handicapped, they tell the truth. They are not on an equal footing with their rivals in the South, or in other sections of New England. It is perfectly natural for them to desire to re-enter the race at even weights, to use a turf expression. When they argue that if the cotton industry, which is one of the principal industries, does not prosper, all business enterprises will be unfavorably affected, they are right.

"But would the remedies which they propose relieve the strain and lift them out of the existing depression? With one of them, the reduction of taxation, we have nothing to do at the present time. The other consists in adding to the working hours. If the prayer of the petitioners were granted and the legislature were to say that the factories might operate their machinery sixty-two hours, or sixty-four hours a week, would all obstacles be overcome? Aside from the pecu-

liar situation in Massachusetts today, and the restrictions which have resulted in fault-finding, it will be admitted, we presume, that the unsatisfactory prices obtainable for cloth are due primarily to overproduction. The proposed change in the laws would add to that production. Place every mill in New England on the Southern basis in so far as running time is concerned, and the load which now clogs the market would be materially increased. Prices would drop still lower. It has been urged that if all hands could compete on equal terms, the weaker concerns would drop out sooner or later and clear the atmosphere, but experience has taught that they go to the rear later rather than sooner. They are possessed of wonderful vitality and tenacity. One little mill which employed seventy-five persons has closed its gates forever, and a few old factories which are poorly equipped for trying times are idle, but the great majority keep pegging away for dear life, and are piling up the accumulation. Too many spindles are turning, and it is the intention to turn them more hours and swell their output. Furthermore, can it be demonstrated that Rhode Island, which is free from many of the restrictions imposed on Massachusetts, is satisfied with the situation, or making a better showing than the mills in this State? It may be that the solution of the problem, or the first step in its solution, does not lie in curtailment by all the mills of the North, but there is a general belief that no other remedy will work. What the next step would be remains to be seen. The Southern basis is out of the question not only for Massachusetts, but for New England, and while the removal of restrictions would place Massachusetts on a par with her rivals in these parts, the position of her rivals is not an enviable one."

And on the proposition for exemption of taxation the same paper says:

"To the end that the industry may remain and prosper, we should all devote our best efforts. We stand on common ground. The operatives cannot live comfortably and happy unless capital is remunerative, and we do not believe capital can be made remunerative for any length of time at the expense of the working people. The latter will seek some other occupation which will pay better. At least they ought to seek it. They may be willing to make temporary sacrifices, but if they are to progress they cannot go back to standards that are permanently lower than those to which they have been accustomed. It follows, therefore, that everything within reason should be done to encourage the capital invested in the mills and assist it out of its present difficulties, not for capital's sake alone, but for the sake of the thousands who depend upon this capital. Nobody who is sane wants to drive it out of business, or out of the State.

"We have banked on it to a considerable extent here in the North. Cities have grown up and homes have been established on the supposition that the corporations would always prove to be successful. It would not be an easy matter to turn to some other enterprise for a mainstay in Fall River or New Bedford or Lowell. It would be anything but pleasant to have the skilled labor now employed supplanted by help who would be contented with much smaller incomes and cheaper homes. There would be a thousand and one changes that would be far from agreeable. But while no obstacles should be placed in the path of managers, it may be doubted if the idea of appealing to the legislature for relief from taxation is a feasible one. In some respects, corporations should be treated as individuals, and they must be left to

work out their own salvation. The spectacle of a firm of business men which found itself in straits applying to the general court for assistance of any kind would excite laughter. It is understood, of course, that so much is involved in the industry in question that it furnishes an excuse for the action which is taken, but it may, nevertheless, be questioned if interference of this kind by the Commonwealth would be wise. It might be difficult to draw the line one of these fine days. Manufacturing centers should be allowed to decide for themselves what is to be done in an emergency. It is customary for communities which are anxious to advance to exempt from taxation certain enterprises for a period of years. That is the bait which they use, and it is their own affair. But for the legislature to say that one kind of tax shall be levied on the cotton factories and another kind of a tax shall be collected from the railroads or the shoe factories would be to establish a precedent which would be pretty sure to make serious trouble. There are a good many things to be taken into consideration besides the strain and embarrassments of the hour."

## VALUE OF SAVINGS BANKS.

## Suggested as Aids to Development in the South.

The letter published recently in the Manufacturers' Record from Mr. Hunking, agent of the Massachusetts Mills at Lindale, Ga., suggests that you publish for Southern information a general outline of the system that has long prevailed at the North of granting charters to savings banks by State legislatures in conformity to permanent laws which carefully guard the deposits of the poor from fraud or embezzlement. The many millions of dollars held by these institutions represent the earnings of farmers and of wage-earners, men, women and children in all vocations. The charter usually grants to men of well-known integrity authority to organize a savings bank and receive deposits from a small fraction of a dollar upward. These charter members constitute a board of trustees that is self-perpetuating. When one dies or resigns the others fill the vacancy with some other honest and capable man. These men elect a president, a secretary and a treasurer, and employ as many clerks as may be required to dispose of the business with as little delay as possible, so that wage-earners may not lose any time in making deposits or drawing out their money.

The laws require that a certain percentage of the money shall be lent on real estate within the State, and especially in the county in which the bank is located, on first mortgages or property the title of which has no flaw. The remainder of the funds must be invested in perfectly sound securities, such as government, State, county, municipal and other official bonds, the interest on which is always paid promptly, or on national bank stock, or dividend-paying corporations, or other securities that are approved by the State bank examiners, who are constantly employed in visiting these banks and investigating the condition of their affairs. Not more than two-thirds of the value of real estate, as appraised by the local tax boards, can be lent on bond and mortgage, nor can loans be granted on the prospective or speculative value of stocks and other securities. In most States the laws place a small tax on the net sum of the annual deposits, instead of requiring the depositors to put the amount of their savings on the personal lists. The trustees of the bank receive no pay for their services, and the salaries paid to the treasurer and his assistants are always

moderate and in proportion to their responsibility.

On opening an account with the bank, if the first deposit is but a dime, or a larger sum, the depositor signs his name and residence on the bank's record, and receives from the bank a little account book in which his money is credited. All future deposits are entered in it, so that he has in possession a legal certificate of what is due him. Every six months the earnings of the bank from loans and from interest on the security investments is carefully ascertained, and a small percentage is set aside to increase the bank's surplus, and the remainder is apportioned to the depositors in proportion to the amount standing to their credit; is entered up in their favor on the bank's ledgers, and is copied in their personal books when they are presented at the counter for this purpose. Thus the interest, though small—not more than 2 per cent.—is added to the principal, and from that time forward increases the depositor's earnings by just so much.

The Catholic priests, when our Irish-American population began to come in great numbers to settle in the United States, were persistent in teaching them the value of saving some of their earnings in these institutions, and in all the New England cities that have large numbers of these among their people there are great numbers of men and women who own houses they rent to tenants at fair prices, because they followed the priests' advice. In some of the large New England cities from 20 to 30 per cent. of the depositors are of Irish birth, and a large proportion of these are servant girls. During the civil war many of the soldiers put in the savings bank the large bounties paid them by the government, States and towns, and when they returned home had enough money in store to enable them to start some small business on their own account, instead of waiting for employment to be offered them.

Taking a broader view, the savings bank, protected by law, is a great contributor to the industrial progress of the North. The savings bank must find some way of letting out its ever-increasing capital. Its rates are low, never exceeding 6 per cent., and often not more than 5. It never cares to make short loans, but will let them stand as long as the interest is promptly paid. Thus it is saved a great deal of work by infrequent changes of repayment. So, when a manufacturer wishes to enlarge his business, or a farmer to make improvements on his farm that will increase its fertility, or to buy improved implements for cultivation, or to make better dairy products by the purchase of the best classes of stock, he can borrow of the banks all he needs, and if he be prompt in the payment of his interest, have all the time he requires to meet his obligation.

What a blessing to the South those State-protected banks would be is apparent. No estimate has ever been made of the very large sum of money that is lying idle in small sums in the towns and country places of the South, that might be gathered into these institutions and add greatly to the quantity of money that could be applied to local industrial development in all parts of its great and richly endowed territory.

BENJAMIN S. PARDEE.

At the annual meeting of the Young Men's Business League at Chattanooga, Tenn., the following officers were elected for the ensuing year: President, Sol Moysey; vice-president, W. A. Sadd; second vice-president, J. H. Cantrell; secretary, William B. Royster; treasurer, Winthrop Barr.

### Truck Growing and Factories.

Referring to the trucking industry which has been encouraged by the Illinois Central Railroad in Mississippi and other States, the Meridian (Miss.) Star has the following, which will be appreciated by the readers of the Manufacturers' Record, as it endorses what this journal has so long been advocating:

"Among the growing and profitable industries of our State there is none that promises more satisfactory results than that of growing fruits and vegetables, and it is a matter of surprise that more attention is not given to it in this immediate locality. The success that has attended this industry, notably on the Illinois Central Railroad, south of the city of Jackson, has been remarkable and has been a source of much wealth to the people of that section. In fact, it has created an almost entire revolution in the so-called money crops of that section. The cultivation of five-cent cotton has been lost sight of and thousands of acres hitherto devoted to its culture are now yielding the juicy tomato, the luscious strawberry, green peas and other succulent vegetables which find remunerative markets in the Northwestern cities.

"There is a degree of thrift and prosperity in the sections referred to that is positively unknown where cotton is depended upon for the 'money crop,' and there is no good reason why the farmers of this portion of the State should not engage in it generally. We are informed that in the sections devoted to trucking buyers come directly to the fields and railway depots and make their purchases from the growers without the intervention of commission and middle men.

"The trucking industry around Enterprise is steadily growing, and has proven to be highly remunerative, bringing in 'cash money' at a time that it is most needed, and now that artesian wells are found to be comparatively inexpensive in that locality, it is probable that they will be used for irrigation purposes.

"Thousands of dollars could be added to the circulating medium of our city if we could arrive at some concerted action among our land-owners and farmers with reference to inaugurating this valuable industry, and we hope to see a horticultural society formed here that will bring this important matter before this community before another trucking season begins.

"The building of mills and factories of all kinds would go hand in hand with the trucking business. When the Northern climates warm up, so the truckers there can get in their produce, then the shipping of truck from the South becomes unremunerative. More people in the towns of the South would create here a demand for the late gardener. To illustrate, a South Carolina writer says: 'The building up of mills has made a home market for the by-products of the farms, such as vegetables, poultry, and so forth, which heretofore have not been profitable on account of the limited demand for such products. As the result, contiguous farm lands have doubled and trebled in value. I know of some instances in the vicinity of these mills where lands that were formerly worth from \$5 to \$6 per acre, are now worth from \$33 to \$100 per acre, and find increased sales at these prices, while before it could not be sold at the lower prices. Another indirect fact that has increased the price of lands in the vicinity of the mills is that thrifty families, earning good wages at the cotton mills, soon accumulate a surplus sufficient to buy a good farm. Of course, under these conditions the value of our business has been increased, and not only this, but farm methods have been improved, lands

more carefully tended, better homes erected, better stock and an improved condition generally exists.'"

### People and Corporations.

Cleveland, Tenn., April 6.

Editor Manufacturers' Record:

It is an old saying that figures won't lie. It all depends in whose hands they are. One of the hardest things to do is to get men to coolly investigate. Even after men are conscious they are wrong they have not the manhood to admit it.

If people have an idea that corporations are totally dishonest, it's very hard to convince them otherwise, especially when some fellow who is supposed to know says so. The terms corporations, trusts and combines are very obnoxious to some people. These terms would not be obnoxious to others. There are countries where there are no corporations or anything else but poverty. We forget that the private corporations contribute their share to charities. Still they are looked upon as soulless, and by some people as general plunderers of mankind. No man is so dishonest or ignorant as to say that corporations do not and cannot do wrong, nor that they are entitled to any more favors than other people. Every man has to fight for existence, so have corporations. In one breath we assert that the people can manage their own business, in the next we invoke governmental aid. Americans ought to get rid of the old idea of governmental sovereignty. They seem to think that governments have unlimited powers and authority. If men would only contrast what the government has done for them with what they have done for themselves, they might have more confidence in their ability to take care of themselves. People forget that there are unwritten laws, as well as written, and as absolute as the planets. We talk about centralization as though it was something that could be prevented. Every statesman knows that all things inherit and possess one of two principles—centralization or disintegration. Too forward movement in either direction is dangerous. The spirit of socialism or communism is tenfold more dangerous than all the corporations, combines and trusts. I do not mean by this that every man who differs from me is a communist or a demagogue. Is there absolutely nothing good in a railroad corporation? From the first day an engine ran over the first road improvements have been continually made and rates reduced. The first travel was little better than in an ox wagon across a poll bridge at four to five cents per mile, but it was so much better in every way that the people felt like giving the companies (who principally lost all their money in the business) an ovation, and, in fact, in some places did.

Twenty miles an hour was flying. But now, when we have palaces to ride in, one-half cents per mile, sixty miles an hour and with perfect safety, we kick.

A certain railroad during the World's Fair transported in six months 4,955,712 people without hurting a single one. They handled 730,486 pieces of baggage, and lost only twenty-six, worth about \$1000. In 1876 the same road carried 18,363,366 passengers and did not hurt a single one. Whoever stops to think of the thousands of demands the people make of them. They clamor till they get a fine depot, and then curse the road because it don't own it. Trains must always be on time. Everything must be right. The road must be solid and smooth. Every rail, bridge and tunnel must be absolutely sound. No matter how dark or heavy the storms or high the waters, the engineer must "pull out" and

crawl over the bridges, must make forty miles around a curve, rocks or no rocks, and if an accident occurs the roads must pay for it. The engineer knows that it's only a matter of time when someone else will whistle at the crossings. The operator must side-track all freight trains and get every case of goods to destination on time.

Any man who will carefully compare the rich and poor of fifty to seventy-five years ago with the rich and poor of today will find that the balance is in favor of the poor, and I brand as false the cry that the rich are growing richer and the poor poorer. As the sentence reads, the words rich and poor are ambiguous. If the "cry" means that all of the rich are getting richer and that all the poor are getting poorer, then this is not true. Then another question is, how much does it take for a fellow to be rich? People who lived fifty years ago and can remember know that the so-called poor class live better today than the rich did then. They have better houses, better churches, better schools, better tables. The people all live better and are nearer equal than ever before, but still the country is full of calamity-howlers. I am not a railroader, have no interest in any corporation, do not pay a cent of tax nor live in my own house, but I can take care of myself.

J. K. P. MARSHALL.

### A \$350,000 Sugar Factory.

It is announced that the Kenilworth Estate, of London, England, has completed the purchase of 5000 acres of land in St. Bernard parish, Louisiana, and it is proposed that the property be extensively developed as a sugar plantation and manufactory.

The consideration for the land purchased was about \$200,000, and it was bought from Mr. Charles Godchaux, of New Orleans, the English estate being represented by Mr. Quinton Hogg (its president), of London, England, who has come to Louisiana expressly to complete arrangements for the proposed enterprise.

Mr. Charles Godchaux has been chosen as the American manager of the English estate, and he states that \$200,000 will be expended in general improvements, including the planting of sugar-cane, and that work on a sugar factory to cost \$350,000 will be commenced in the near future. The Kenilworth Estate will also buy 5000 additional acres of lands for sugar cultivation very soon.

Mr. Godchaux and associates will also reopen their extensive sugar-cane lands, etc., in St. Bernard parish when the Kenilworth factory is completed.

### Minerals of Alabama.

According to State Geologist Eugene A. Smith, the mineral production of Alabama in January and February, 1898, reported and estimated, was as follows: Coal, 1,003,463 tons; coke, 210,069 tons; pig iron, 164,637 tons; iron ore, 365,165 tons; limestone and dolomite, 119,420 tons; lime, 24,619 barrels.

Ice-making has grown to be such an important industry that an article on "A Beginner's Experience in Ice Making," in the April issue of Modern Machinery, of Chicago, will probably interest a wide range of readers. The article is written in the vernacular of an engineer who took charge of an ice-making plant in the South. He learned many useful lessons, which are set forth with homely wit.

The mines of the Tennessee Coal, Iron & Railroad Co., at Pratt City, Ala., produced 173,000 tons of coal during the month of March. This is the largest output for a single month in the history of this plant.



## COMMERCE.

This department is devoted to a record of the rapidly developing commerce of Southern ports.

### GROWTH OF NEW ORLEANS.

**Its Expanding Commerce as Viewed by the London Times.**

The London Times, two weeks ago, had the following notice of the increasing export trade of New Orleans:

"The rapid increase in the export trade of New Orleans, largely by reason of improved railway communication with the grain-growing regions of the Western States, has been the theme of consular reports from that place in recent years. From the latest of these, which has just been issued by the foreign office, it appears that New Orleans is now the third most important exporting port in the United States, coming next after New York and Boston, and that in the export of wheat only New York and Baltimore surpass it. The shipping is increasing year by year, not only in actual tonnage, but also in the size and quality of the vessels employed. In a total export trade during last year of nearly 20,000,000 sterling over 8,000,000 worth was sent to ports in the United Kingdom. The grain trade has during the last six years risen from a very trifling amount to be one of the most important of exports. During the year ended August 31 last nearly 34,000,000 bushels of cereals were shipped from New Orleans to Europe, and of this over 18,000,000 bushels went to British ports. By far the largest part of this was maize, but during the current year the shipments will be more diversified, and will include wheat, rye and oats as well. The export of cotton for the twelve months up to July 31 last year amounted to 983,000,000 pounds, or nearly 2,000,000 bales, of a value exceeding 14,000,000 sterling, of which Great Britain took nearly half, France nearly quarter, Germany and Italy being the other important consumers; but the total cotton exports of the United States in the same period was over 6,000,000 bales, of which Great Britain took more than half. Next to cotton sugar is the most important product of Louisiana, and the area under cultivation for it is increasing greatly. During recent seasons the planters have been constantly striving to reduce the cost of production, and labor-saving appliances are adopted wherever possible, while economy in heat generation and evaporation, together with more complete extraction, are constantly aimed at. Rice is the third most important product of the State. It is nearly all taken to New Orleans to be milled; but the harvest last year, owing to prolonged drought, was the smallest in twelve years. It was about 550,000 sacks, against 1,500,000 the previous year. But though the general volume of merchandise passing through New Orleans was very much greater last year than in previous years, the consular states that the misfortune of the city 'was, in common with other great commercial centers of the country, to have handled a large volume of exports with little profit in them.'"

These statements are official, having been sent by the British consul at New Orleans to London, from whose report the Times obtained them. They declare two facts: First, that New Orleans has splendid shipping facilities, and next, that the railroads from the Northwest can put the grain of that section aboard ships in that city at freight rates that make it pay the Western grain shippers to send by the Southern, instead of the Eastern route. This business item in the London Times is, therefore, of great value to British

purchasers, as showing them that they can get cotton, cottonseed meal and oil and all the Western cereals at lower rates than they can for shipments by the transportation lines running to the great Eastern commercial ports.

The effect of this consular notice must be to induce British merchants dealing in the articles named to send their ships to New Orleans for them, instead of to the North Atlantic ports. It is an unintended advertisement that will benefit Louisiana shippers and the railroads that supply them with the cereals of the great growing regions of the Northwest. The consul's intimation that the great increase in the volume of shipments from New Orleans have not paid much of a profit will not deter the shippers of that city or the railroads that supply them from extending their operations, for a large commerce done on a very small margin of profit pays in the long run much more than one of small dimensions, although the actual per cent. of the latter may be much higher.

### SHIPBUILDING CONTRACTS.

**Ships Needed for Southern Fleets—Opportunities for More Shipyards.**

The recent purchase by the government of steamships plying between Northern and Southern ports, noted elsewhere, will undoubtedly cause the navigation companies to contract for a number of additional vessels within the next few years. The Morgan Line, between New York and New Orleans, which is operated in connection with the Southern Pacific, will be obliged to have vessels to replace those of its fleet which have been pressed into service by the United States, while the Cromwell Line will probably need an additional steamer. If the Old Dominion Steamship Co. parts with its latest additions—the Jamestown, Yorktown and Princess Anne—which may be bought by the government, it will be contracting for duplicates of these, if not for larger vessels. Consequently, with the proposed new vessels for the Pacific Mail Steamship Co., each of which is to be 10,000 tons, there will be plenty of work for American shipyards in the near future. At the same time, an excellent opportunity is offered for additional companies to engage in shipbuilding in the South. If the Spanish trouble does not suspend the steamship service between the Northern and Southern ports, it is safe to say that within the next year contracts will be given out by Southern companies for at least eight steamers, ranging from 3000 to 5000 tons each, and costing from \$250,000 to \$700,000 each.

Regarding the necessity of additional Southern shipyards Mr. George C. Power, land commissioner of the Illinois Central, is quoted as follows:

"There are few large shipbuilding yards in the United States anyway; not half so many as there should be. I refer to mercantile yards, not those under the supervision of the government. The time is not far distant when there will be much more activity in shipbuilding in this country than there is today, and I should like to see New Orleans secure one of the first of the new plants that are sure to go up. The water here is all that can be desired, much better even than many of the other ports have where there are shipyards, and where, for floating big ships, deep water and plenty of it are required. Why, it would be the easiest matter in the world to start an enterprise like that in New Orleans. Take, for instance, the history of some of the larger shipyards in the United States today. They started as small enterprises and grew gradually, until now such yards as Cramps', at Philadelphia, is in a condition, with its

magnificent works, to build almost any sized-vessel wanted in the mercantile world.

"I was very much impressed the other day when a certain gentleman in New Orleans told me that he was compelled to ship one of his boats clear to Halifax in order to have some repair work done. This should not be. There should be a shipyard right here in New Orleans."

### A Department of Commerce.

A report of the hearing before the Senate committee on commerce in relation to a bill to establish a department of commerce and industries has been published as a Senate document. It includes statements by Mr. Charles S. Hamlin, a former assistant secretary of the treasury; Mr. Alden Speare, of Boston, Mass.; Mr. Edward H. Haskell, representing the Boston Associated Board of Trade; Mr. Francis E. Thurber, president of the United States Export Association; Mr. Ferdinand W. Peck, president of the National Business League; Mr. John W. Ela, counsel of the National Business League, and Mr. Theodore C. Search, president of the National Association of Manufacturers. The last named gave in succinct form data showing a relative importance of agriculture and manufactures to foreign trade, summarized practical reasons for the establishment of the bureau, and in conclusion said: "Surely no country has greater need of such a governmental department than the United States. No country has ever shown such remarkable industrial progress as has taken place in the United States in the last quarter century. Our manufacturing interests exceed in importance all other interests in which our people find employment and investment for their capital, and yet there is no department of our national government invested with any responsibility for the promotion of the welfare of our great industries. The growth of our foreign trade, which just now is of most vital importance to our manufacturers, would be greatly promoted by such a department as that which it is proposed to create. The present government agencies for this purpose are inadequate for the needs of our manufactures; our consular service needs improvement and a broadening of its scope, which seem to be impracticable under the control of the State departments, whose functions are diplomatic rather than commercial. In many ways it would be possible for a department of commerce and industry to promote interest of trade at home and abroad, and it would seem that there should be no valid objections to such legislation."

### Vessels for Southern Coal Trade.

The Atlantic Transportation Co., which, as already stated in the Manufacturers' Record, has been organized with \$3,000,000 capital to engage in the business of shipping Southern coal, is securing vessels for its trade. A Boston dispatch states that the company has chartered the Boston steamer Sterling and the barges J. F. Merry and Ring-leader; also the entire fleet of barges owned by the Boston Towboat Co., besides the steamer Orion and the tugs Underwriter, Storm King and Taurus, and the whaleback steamer City of Everett. Other Boston vessels chartered by the Atlantic Company are the steamer Shawmut and the four-masted barge Atlas, the tug Mars, barges Delaware and Juniata and George M. Winslow's barges Annie W. Weston, Chalmette, P. J. Carleton, Mystic Belle and Woodside. These vessels represent most of the coal-carrying craft owned in Boston. They will be placed in service between New-

port News and Northern ports. The company also has contracted with shipbuilders for six barges of 4000 tons each, and three large steamers.

### Port Royal Dock.

The government has at last decided to place the dry-dock at Port Royal, S. C., in condition for use, and it will be ready to repair all government vessels which may be injured while on duty south of Norfolk. The entrance to the dock is now being dredged to accommodate vessels of the deepest draft. The new \$50,000 repair shop for the construction bureau has just been finished, and the steam engineering bureau has shops where ordinary repairs to machinery can be quickly made. The dock is so located that the largest vessels may moor alongside, receive coal and be overhauled after coming out of the dock, and labor is so abundant there that large forces of men can be secured on short notice. Plans for the protection of this station are now being quickly carried out by the War Department in the building of emplacements at the mouth of the Port Royal river.

### Old Bay Line Improvements.

Few people have any idea of the large amount of money required to keep a fleet of vessels in good condition. Each year the Baltimore Steam Packet Co. expends several thousand dollars on each of its steamers in making alterations and improvements, and in decorating the boats when needed, and in providing conveniences for the comfort of passengers. For the last two months at least one of its vessels has been in the dock undergoing the annual overhauling. The Alabama, which was the last of the fleet to go out of service, has again resumed her trips on the Chesapeake in practically as good condition as when she was launched.

### Terminals at Savannah.

The terminals of the Ocean Steamship Co. at Savannah, Ga., are nearly completed, and it is expected that all will be ready for use by September 1. One of the slips 820 feet in length has been finished, and the low ground in the vicinity of the wharves is now being filled in and leveled. A number of large sheds are being constructed, and a considerable wharf frontage. The slip referred to will give berth room for four large steamers and four sailing vessels at a time.

### Jottings at the Ports.

The Maryland Steel Co. has begun filling an order from Australia for steel rails. About 1000 tons have been shipped already.

According to a dispatch from New Orleans the Texas & Pacific Railroad Co. has determined to make several improvements at Westwego, its tidewater terminus, and has given out contracts for wharves to be added to those now in use.

The steamship Merrimac recently arrived at Sparrow's Point, Md., with over 5000 tons of iron ore. This is understood to be the largest cargo of the kind ever brought to Baltimore. On the same day another steamship with 3200 tons arrived, making the total imports nearly 9000 tons in one day. Most of this ore is used by the Maryland Steel Co.

The New Orleans Bureau of Freight and Transportation has arranged with Messrs. Gibbon & Son, owners of the steamboat Oak, to handle shipments between New Orleans and Bay St. Louis, Gulfport, Biloxi, Scranton and Mobile. This vessel has heretofore plied between Mobile and the Gulf coast, and its coming to New Orleans is a new departure.

## RAILROAD NEWS.

[A complete record of all new railroad building in the South will be found in the Construction Department.]

### IMPORTANT COMBINATION.

Plans of the Knoxville & Bristol Company as Outlined by Its Attorney.

The Manufacturers' Record has received additional information relative to the plans of the Knoxville & Bristol Railroad Co., which, as already stated, has been formed with a view of completing a line between the cities mentioned in Tennessee. This would reach the Norfolk & Western at Bristol, and give the latter system an entrance to Knoxville, and, by connection with the Atlanta, Knoxville & Northern, a terminal at Atlanta, Ga. The Knoxville & Bristol Railroad, in which Adolph Segal, of Philadelphia, is interested, will have a connection with several lines in Eastern Kentucky, one of them, the Louisville & Southeastern, which a syndicate, composed of Mr. Segal and others, purchased at foreclosure sale a few weeks ago. The Knoxville & Bristol plan is thus outlined in a letter to the Manufacturers' Record from Mr. Thomas B. Harned, 400 Chestnut street, Philadelphia, who is counsel for the company:

"My clients recently purchased the railroad property formerly known as the Morristown & Cumberland Gap Railroad Co., running from Morristown to Corryton, in the State of Tennessee. We have recently taken out a charter incorporating the Knoxville & Bristol Railway Co., which company has taken title from my clients to the above-mentioned property. Under the charter we have a right to build a road from Knoxville to Bristol, and if said road is built, then we will utilize a large portion of the line which we now own. We will probably build from Blaine southward a distance of eighteen miles to Knoxville, and from Bean's Station northeastward about seventy-five miles to Bristol."

### New Line to Wheeling.

Recently the Manufacturers' Record referred to the plan of the Pittsburg, Connellsville & Wheeling Railroad Co., stating that this corporation was promoting a line from a point in Pennsylvania to Wheeling, W. Va., by the way of Moundsville. Alexander P. Funk, president of the railroad, confirms this report, and writes as follows:

"As to Moundsville, West Virginia & Wheeling Railroad, the intention is to extend the Pittsburg, Connellsville & Wheeling Railroad, forming a direct line from Uniontown, Pa., to Moundsville and Wheeling, W. Va., a distance of about eighty miles. The company will begin work first of next month and drive it to a finish."

The Pittsburg, Connellsville & Wheeling will connect at Uniontown with both the Pennsylvania and Baltimore & Ohio railroads, and will form a portion of the new line between Wheeling and Pittsburg through the northern section of West Virginia. P. Minturn Smith, president of the Standard Structural Co., 11 Broadway, New York, is president of the Moundsville, West Virginia & Wheeling Railway Co.

### Praise for the Central.

In a recent interview Mr. George Gould, who is at the head of the noted Gould system of railroads, is quoted as speaking of the Illinois Central in the following terms:

"The Illinois Central, running from Sioux City and Chicago to New Orleans,

is the greatest and richest north-and-south line system, barring our Iron Mountain route. It connects the temperate zone with the tropics. It trades corn, apples and pork for cotton, watermelons and oranges. It drains the crops from Iowa, Wisconsin, Illinois, Missouri, Kentucky, Tennessee and Mississippi, and puts them in New Orleans. It carries passengers from Chicago to New Orleans, 1000 miles, in twenty-four hours. It is the quickest route from Louisville and St. Louis to New Orleans. It is one great route from the corn bins of Iowa and Illinois to the cotton fields of the Gulf. It fixes the passenger and freight rates between Sioux City on the Missouri, Chicago on Lake Michigan, St. Louis and Memphis on the Mississippi and Louisville on the Ohio, and New Orleans."

### A Mississippi Enterprise.

In a letter to the Manufacturers' Record, Mr. C. H. Pond, vice-president of the Yazoo Delta Railroad, in operation between Moorhead and Ruleville, Miss., confirms the report that the Illinois Central Railroad Co. has become interested in this line. Extensions aggregating thirty-eight miles are now being built which will connect the line with the Yazoo & Mississippi Valley division of the Central. The Yazoo Delta is a new line, extending through one of the most productive sections of Mississippi, and will be a valuable feeder of the Illinois Central.

### High Price for Coal.

The Consolidation Coal Co., whose mines are on the Baltimore & Ohio Railroad near Cumberland, Md., ships considerable coal to San Francisco for smelting purposes. The company gets eighty-five cents a ton for the coal at the mines, and then it is sent over the B. & O. to Locust Point, where it is loaded on vessels for San Francisco. From there it is shipped by rail to the interior points, and then placed in sacks and carried on mules to the small mining settlements scattered through the mountains. It is stated that some of this coal is retailed in these settlements at \$100 a ton, or nearly five cents a pound, on account of the distance and difficulty in transporting it.

### Railroad Notes.

B. L. Winchell has been appointed general passenger agent of the St. Louis & San Francisco Railroad, the appointment to take effect May 1. Mr. Winchell has been associated with the Union Pacific, Denver & Gulf Railroad in the same capacity.

The Norfolk & Portsmouth Belt Railroad Co., which is building a railroad in the suburbs of Portsmouth, has elected the following officers: A. J. Cassatt, president; Henry Fink, vice-president; Caldwell Hardy, treasurer; O. J. De Rousse, secretary.

In a letter to the Manufacturers' Record Mr. B. J. Baker, of Petersburg, W. Va., writes that no company has as yet been organized to build the proposed railroad from Cumberland, Md., to Petersburg. The question is being agitated with the view of organizing such a company.

The San Antonio & Gulf Shore Railroad Co., which has built a line out of San Antonio a distance of about thirty-eight miles, has been reorganized, with the following officers: President, Geo. W. Brackenridge; vice-president, T. H. Franklin; secretary and treasurer, John A. Fraser; general manager and superintendent, George Dullnig; general freight and ticket agent, J. W. Graves.

## TEXTILES.

[A complete record of new textile enterprises in the South will be found in the Construction Department.]

Correspondence relating to textile matters, especially to the cotton-mill interests of the South, and items of news about new mills or enlargements, special contracts for goods, market conditions, etc., are invited by the Manufacturers' Record. We shall be glad to have such matter at all times, and also to have any general discussion relating to cotton matters.

### TOO POOR TO MOVE.

Restraint Upon the Transfer of Northern Mills to the South.

"It is unquestionably true that the Southern mills have great advantages over Northern mills. If my mill was located in the South we could save \$255,000 a year in the matter of wages, fuel and taxes. The labor-saving would be \$150,000. We use 30,000 tons of coal a year, and in this item there is a difference of \$2 a ton in price delivered, which would make a saving of \$60,000. We pay \$55,000 a year in taxes, which we would escape in the South for the first ten years, and thereafter the taxes would be very light." These are the words quoted by the Boston News Bureau of a prominent mill treasurer, who continued:

"The advantages of Northern mills are in the cost of selling their product and their strong credit, while most Southern mills are obliged to have their goods guaranteed or money advanced to them.

"Southern mills with Northern management, like the Massachusetts and Dwight mills, have a big advantage over Southern mills under Southern management. They pay no salaries outside of a local agent, as the treasurer of the Northern mills acts for the Southern mills, and they get the advantages of the Northern mills' accumulated capital, lower rates for money and cheap selling expenses.

"For Northern mills to take advantage of the great saving in labor, fuel and taxes requires a great outlay of money. A great many Northern mills would like to take advantage of the South, but lack the money. Many mills have their plants just free from debt, and they cannot afford to move, and they cannot increase their capital, as people will not put money into cotton manufacturing. It is apparent that the reason there is not a greater exodus of Northern mills to the South is that they are too poor to move, and this is what will keep the mills in Massachusetts."

### FOR TEXTILE STUDENTS.

Valuable Samples May Be Lent Lowell School.

A dispatch from Boston says that the Lowell Textile School will shortly receive a loan of a portion of one of the most valuable collections of ancient and modern textile fabrics that exists in America.

For some years the Boston Museum of Fine Arts has been following out one of the purposes for which the museum was founded, to provide opportunities and means of instruction in "drawing and designing, with their industrial application," and its first expenditures for works of art at the exhibition of 1876 were in that direction.

Limited means have hitherto prevented the development of its resources by any considerable purchases, but the administration has kept the object steadily in view. By many recent gifts, and especially by the liberality of Mr. Denman W. Ross, the collection now includes some thousands of examples of silks, satins, brocades, velvets, linens, laces, embroideries and other textiles from all

quarters of the globe; early Egyptian and Coptic fabrics, those of the looms of Persia, India, China, Japan and Peru, the handwork of the Turkish provinces, and of many primitive peoples, and is especially rich in specimens of Spanish, Italian and French weaving of the fourteenth to the eighteenth centuries.

It is confidently believed that a study of these selected examples of design and color must tend to elevate the standard of taste and be of great practical benefit to all who direct the arts of dyeing, weaving or printing, and the manufacture of paper hangings.

The samples are mounted on frames, classified and arranged chronologically and by nationalities.

Director Brooks, of the Lowell Textile School, has been negotiating with Gen. Charles G. Loring, director of the Boston Museum of Fine Arts, and is now in a position to announce, subject to the approval of the trustees of the Lowell School, that a very valuable selection of samples from the Boston collection will be placed in the Lowell Textile School, and probably replaced from time to time with other samples. This will give not only the students of the school, but the manufacturers of Lowell and vicinity an opportunity of studying these superb examples of ancient and modern art.

### American Cotton for Japan.

In a carefully written review of the cotton industry in the East, the correspondent at Tokio, Japan, of the London Chronicle, says that the Japanese cotton manufacturers in 1896 made a departure in the development of the Japanese cotton industry by starting a large mill fitted for the production of a finer yarn, mainly using the Egyptian cotton. He traces the change to the use of American cotton on account of its cheap price. He predicts a development of the industry in the direction of a production of better and finer goods, and explains thereby the growing demand for American and Egyptian cotton. He adds: "During 1897 Japan has imported large amounts of American staple, but we can hardly tell how rapidly this importation might be augmented."

### Wool Growing South.

While it is not to be expected that cotton growing and other agricultural pursuits are to be displaced entirely by the wool-growing industry, it is evident from present conditions that a great battle between wool and cotton is imminent in the South. Texas furnishes a remarkable object-lesson for the States that have been depending on cotton for so many years. The Lone Star State has demonstrated the practicability of wool growing. She has prospered while her neighboring States have suffered, because their cotton crops were bringing returns constantly on the decrease. The present development of wool growing in the South must work to the benefit of the wool-growing interest and the country in general.—The Wool Record.

### 6000-Spindle Mill for Chattanooga.

Application has been made for a charter for the Vance & Kirby Manufacturing Co., of Chattanooga, Tenn. The incorporators are prominent business men of Chattanooga, and include Messrs. Vance & Kirby, who are experienced in cotton manufacturing; H. W. McElwee, L. A. Peace, H. K. Vance, R. N. Phillips and R. D. Twinn.

Plans for the company's buildings have been submitted and approved and their construction will be commenced at once, and an equipment of 6000 spindles and complementary machinery will be installed. Accommodation will be provided



for 10,000 spindles. Mr. James C. Vance is the leader in this enterprise.

#### Improving a Knitting Mill.

Some important improvements are to be made immediately to the mill of the Alden Knitting Co., of New Orleans, La. The mill is running double time, with an extra set of operatives, and because of increasing orders will have to facilitate operations to some extent.

An addition will be established in which the cotton used by the mill may be carded and spun, thus making its own yarns, which heretofore have been purchased in the market.

Twenty-four new knitting machines will also be installed soon. About 150 operators are employed during the day and 125 at night. A large order for the government is now being produced.

#### Fairfield Cotton Mills.

The Fairfield Cotton Mills, of Winnsboro, S. C., is just starting up its looms and commencing the production of its goods. The entire plant is running day and night. The company has an equipment of 5000 spindles and 300 looms, and the product is four-yard goods of fifty-six and sixty picks. A sample of the goods presents itself as whiter than usual for its class, being the production of Fairfield cotton, which is noted in the South Carolina mills for its excellent spinning qualities and fleecy whiteness. Mr. J. M. Beaty is secretary-treasurer of the company.

#### The Cotton Movement.

In his last report for April 8 Secretary Henry G. Hester, of the New Orleans Cotton Exchange, shows that the amount of cotton brought into sight during the season has been 10,314,902 bales, an increase of 2,256,582 over last. Exports were 6,393,036 bales, an increase of 1,196,123; Northern spinners' takings 2,057,413 bales, an increase of 537,827; Southern spinners' takings 822,101 bales, an increase of 40,746 bales.

#### Textile Notes.

Twenty-two cotton mills at New Bedford, Mass., which closed on January 17, were re-opened tentatively on Monday.

Work is progressing on an addition for the Anniston Manufacturing Co., of Anniston, Ala. The addition will be one story high, 30x50 feet.

The plans for the new factory of the McAden Manufacturing Co., of McAdenville, N. C., are now being prepared by Mr. George E. Ladshaw, of Spartanburg, S. C.

The Cleveland Cotton Mills, of Lawndale, N. C., will erect a large mercantile building and establish a department store. Plans for the proposed structure are by Mr. C. C. Hook, of Charlotte, N. C.

Messrs. L. H. Lentz and E. M. Asbury, of Mount Holly, N. C., are organizing a stock company for the purpose of building a cotton mill at Norwood, N. C. It is proposed to put in an equipment of 5000 spindles and complementary machinery.

The Balfour Manufacturing Co., Wm. B. Troy, Balfour, N. C., contemplates the establishment of a knitting mill, with pants and shirt factory attached. Estimates on machinery are now being secured.

A \$50,000 stock company will be organized at Concord, N. C., to build a cotton mill. Arrangements have been closed for the site for this enterprise and the promoters hope to begin work on the buildings very soon. Mr. J. C. Lippard is interested.

It is stated that Mr. E. G. Richmond,

Mr. Campbell and others will organize a \$100,000 company to build a cotton mill at Chattanooga, Tenn. An equipment of 10,000 spindles is proposed. Reports say that all the capital necessary for this enterprise has been secured.

The issuance of bonds for \$40,000 which has been authorized by the Bamberg Cotton Mills, of Bamberg, S. C., will not be expended on new machinery, the additional equipment for which it is to pay having been put in some months ago.

The Brooks Manufacturing Co., recently chartered at Greer Depot, S. C., is organized for the purpose of continuing the operation of the cotton-batting factory of E. S. Brooks. The mill will be improved with some new machinery, and a warehouse will be erected.

There is a movement on foot at Courtland, Ala., for the erection of a \$25,000 cotton mill, and a stock company is now being formed. Among those interested in the enterprise are Messrs. P. M. DuBose, L. G. Hall, H. D. Bynum, J. H. Gilchrist, George M. Gautch and E. H. Peppee.

The stockholders of the Bamberg Cotton Mill held a special meeting at Bamberg, S. C., last week and authorized an issue of \$40,000 in bonds. A majority of the bonds have been taken in Bamberg and the remainder will be sold to Baltimore parties. It is stated that the funds acquired from the sale of the bonds will be invested in additional machinery.

The Cedartown Cotton Manufacturing Co., of Cedartown, Ga., contemplates the erection of another cotton mill, and will make a proposition for its immediate establishment. A plant of about 4000 spindles is proposed, and doubtless arrangements will be made to accept the company's offer. The company already has a 4000-spindle mill in Cedartown, and is building another of the same size.

#### Annual Meetings.

At the annual meeting of the Augusta Southern division of the South Carolina & Georgia Railroad Co. the following directors were elected: John W. Weed, of New York; John M. Denison, of Baltimore; John W. Cochrane, of New York; J. H. Davison, of Augusta; James U. Jackson, of Augusta; P. H. Langdon, of Augusta; Dr. J. N. Oliphant, of Wrens; John W. Whiteley, of Gibson; J. A. Irvin, of Sandersville; C. R. Pringle, of Sandersville, and Macon Warthen, of Warthen. The directors elected James U. Jackson, president; P. H. Langdon, vice-president, and F. W. Schofield, secretary and treasurer.

At the annual meeting of the Galveston, Houston & Henderson Railroad Co. the following board of directors was elected: F. P. Olcott, George J. Gould, Henry C. Rouse, New York; Leroy Trice, N. A. Stedman, James A. Baker, Jr., and R. B. Baer, Texas. The directors elected F. P. Olcott, president; Leroy J. Trice, vice-president; A. A. Van Alstyne, secretary and treasurer; H. B. Henson, assistant secretary, and J. H. Hill, manager.

At the annual meeting of the Missouri, Kansas & Texas Railroad Co. the following officers were elected: President and chairman of the board, H. C. Rouse, New York; vice-presidents, Colgate Hyatt, New York; J. N. Simpson, Dallas; D. Miller, St. Louis; general manager, A. A. Allen, Dallas, Texas; treasurer, R. A. V. Tomlin, Dallas; secretary, Charles A. Forrest, Dallas, Texas.

At the annual meeting of the American Railway Association at Louisville, Ky., President E. T. D. Myers, of the Richmond, Fredericksburg & Potomac Railroad Co., was re-elected president.

## COTTONSEED OIL.

This department is open for the full and free discussion of trade topics and practical questions, and contributions are invited from men who are identified with this industry. Items of news are always acceptable.

#### The Market for Cottonseed Products.

New York, N. Y., April 12.

No new developments may be reported with regard to the market for cotton oil. Trading continues dull and the policy of limiting purchases to actual needs only is still strictly adhered to, although the movement on old contracts has been fair. Stocks in store at this market or in the country are considerably less than is usual at this time of the year. The apprehension that a higher duty on cotton oil may be imposed by France has made no apparent impression on shippers here in the way of stimulating trade. This is somewhat surprising, seeing that stocks in Marseilles and Europe generally are being rapidly depleted. The possibility of a rupture between this country and Spain has doubtless much to do with the present dullness. Business is practically suspended with regard to new spot orders pending the outcome of the President's message, delivered yesterday. Lard has declined since our last and is now quoted at 5.15 cents, Chicago, May delivery. The latter price indicates a sharp decline from 5.35 cents, due to expectation and general suspense experienced in the present international crisis. The higher price for lard referred to exerted little, if any, benefit on the compound-lard market, very little business being reported. Tallow is slow of sale, but the price is well maintained, 3.9-16 cents being quoted. Very little oil is on offer at the mills, and as bids are now lower than a week ago, the disposition to hold stocks until an upward movement in the market takes place is manifest. There are small quantities of summer yellow on offer here at 22 cents, but larger quantities cannot be touched under 22½ cents. Barreled crude is receiving little attention here, although stocks are light. The higher grades of oil are in better demand, and choice butter oil is also in improved request at prices herewith furnished. It is worthy of note that while English cotton oil has not advanced, it is decidedly firm, and in view of the shortage of Egyptian seed an upward movement is among the probabilities. The import of Egyptian seed into London during the last week in March was 17,640 tons, against 26,350 tons corresponding time last year, while holders in Alexandria offer nothing at the moment in expectation of higher prices. May shipments are nominally quoted at £4 16s. 9d. The speculative purchases of cotton oil, made a few weeks ago when provisions and lard appeared to be booming, are looked upon at this critical period as being problematical bargains, and in at least one instance a disposition to sell at a concession is shown, although important holders offer nothing pending the uncertainty. There can be no question, however, that under normal conditions the outlook for cotton oil would bear favorable comparison with corresponding periods in previous years. Consumption of oil abroad is greater than usual; packers are friendly to the article; the manufacture of margarine is on the increase, and hog and beef fats are relatively in a favorable position. The following are closing prices: Prime crude, 19½ to 19¾ cents; prime crude f. o. b. mills, 14½ to 15½ cents; crude, off quality, 18½ to 19 cents; prime yellow summer, 22 to 22½ cents; yellow summer, butter, 24 to 28 cents; yellow summer, off quality, 21½ to 22 cents; white summer, 24 to 26 cents; yellow winter, 27 to 29 cents; white win-

ter, 28 to 30 cents, and soap stock, ¾c. to 1½c. per pound. At the former price several large sales of soap stock are reported.

Cake and Meal.—There is no important change to report. The demand for domestic consumption is light, and as stocks have accumulated abroad, importers in Great Britain and the Continent are willing to accept rather less money.

#### Cottonseed-Oil Notes.

The foreign exports of cottonseed products from the port of Galveston, Texas, for the month of March are reported as follows: Cottonseed oil, 270,273 gallons, valued at \$62,660; cottonseed cake and meal, 60,689,672 pounds, valued at \$501,978.

A new cottonseed-oil mill is to be added to the list of enterprises at Jackson, Miss. Mr. J. J. Culbertson, of Shreveport, La., and Eastern capitalists will commence at once the erection of a cottonseed-oil mill with a capacity of 150 tons per day. The cost of the mill will be \$150,000, and the plant will be in operation for the growing season.

An application for a charter for the Richmond Cotton Oil Mills was filed last week in Chattanooga, Tenn. This charter is for the purpose of consolidating the Chattanooga Cotton Oil Mill, Alton Park; the Roberts Cotton Oil Mill, Kenton, Mo., and the new mill now building at Memphis, under one name. The central office will be in Chattanooga.

The market for cottonseed products in Texas is quiet, there being only a small export movement in meal and cake. Cottonseed oil is dull, all the South Texas mills having closed down, and the only mill running in Central Texas is at Marlin. In North Texas several mills will not finish crushing until June, while several may run through the entire season. Meal and cake is steady at \$15 to \$16.50 per short ton f. o. b. mill. Cottonseed oil is quoted at 14½ to 15 cents per gallon for prime crude loose, and prime summer yellow is offered at 16½ to 16¾ cents f. o. b. mill.

In New Orleans the market for cottonseed products is quiet, with a limited demand for oil, and values about steady. Meal and cake are being exported, and prices rule about steady, with no urgent demand. Receivers' prices are quoted as follows: Cottonseed, \$7 per ton of 2000 pounds net to the mills, no commission of any kind to be added; cottonseed meal jobbing per carload at depot, \$17 per short ton of 2000 pounds; for export per long ton of 2240 pounds f. o. b., \$18.75; oilcake for export, \$19 to \$19.25 per long ton f. o. b.; crude cottonseed oil at wholesale or for shipment, strictly prime oil, crude, 15½ cents loose f. o. b. tanks at Mississippi valley points; in barrels, 18 to 18½ cents; cottonseed hulls delivered per 100 pounds, according to location of mill, 12 to 17½ cents; linters, according to style and staple—A, 3½ cents; B, 3½ cents; C, 2½ to 3 cents; ashes, none; refined cottonseed oil, prime in barrels per gallon at wholesale or for shipment, 21½ to 22 cents for export.

Eighteen progressive business men of Richmond, Va., have pledged themselves to subscribe to a \$50,000 capital fund upon which will be organized a company to bring new industrial plants to that city as soon as 100 subscribers have been obtained.

According to the News and Observer, Raleigh, N. C., has spent and contracted to spend nearly \$500,000 during the past eighteen months in new school buildings and churches, new stores, factories and other business houses, and new residences.

## MECHANICAL.

### High-Duty Pumping Engine.

This engine was installed about two years ago for the water works at Jackson, Tenn., and was designed and built by the Snow Steam Pump Works, of Buffalo, N. Y., also designers and builders of the vertical triple-expansion water-works pumping engine at Indianapolis, Ind. This engine is of the horizontal cross-compound crank and fly-wheel high-duty condensing type. Its capacity is 1,000,000 gallons in twenty-four hours, against a domestic pressure of sixty-five pounds per square inch, or a fire pressure of from 100 to 130 pounds per square inch, with a steam pressure at the throttle of ninety-five pounds.

The steam cylinders and pump cylinders are located at opposite ends of the engine, with the running-gear and fly-wheel between them. This arrangement shortens the engine by about half the diameter of the fly-wheel less than the length of the ordinary arrangement with the pump cylinders placed at the rear of the steam cylinders.

With this location of the cylinders access is much more readily had to the interior of the same, since the cylinder heads can be entirely removed and pistons or plungers withdrawn, if required, without taking out the rods, or pulling off the tie-braces, which tie the pump and steam cylinders together, when the former are placed at the rear of the latter. Or, if any work has to be done to the interior of the steam cylinders or pistons, it is convenient to have the end of the cylinder clear and unobstructed by piston rods, tie-braces and the forward end of the pump cylinders, which are ordinarily cramped as close to the steam cylinders as is possible so as to reduce the length.

The steam cylinders are of the "Corliss" type; valve chests cast with the cylinders, as near the end of same as possible, with short direct ports leading into the cylinder bores, keeping clearance down to a minimum. The builders claim that they are decidedly set against placing the valves in chests cast with the cylinder heads, as the increased difficulty in removing the heads, due to the increased weight and bulk, and on account of having to disconnect the valve-gear connections and a goodly part of the lagging whenever the heads are to be taken off, with the possibility of getting the valve-gear connections shifted from their proper adjustments, and the extra time required to remove these heads, more than offset the small gain due to the slightly reduced clearances in the cylinders. The builders claim that it would take twice as long to remove a head which has the valves in it than would be required to remove the plain, bare head, and more than three times as much trouble, which forces the admission that the complex head would not come off at the first sound of irregularity in the cylinder on account of the greatly increased trouble in removing it, while the small trouble and time required to remove the plain head would not stand in the way of its immediate removal.

The steam cylinders are steam jacketed, the jacket space being cored between the inner and outer shells; each cylinder rests on two exhaust feet, which are bolted to the foundation and to pads cast with the exhaust-valve chests; these exhaust feet also act as exhaust-steam ducts, carrying it away from the exhaust-valve chests to the exhaust pipes. All heads are steam jacketed.

The steam-distribution valves are of the regular Corliss type, and are driven by forged-steel T-headed stems, which work

through stuffing boxes and ample guides in the front bonnets. The valve gears are of the Corliss type, of a new design, and are operated through carriers, carrier-rods and wrist-plates in the usual manner, with adjustable stub-ends and connections throughout.

The point of cut-off in the low-pressure cylinder is adjustable by hand by means of a very handy quadrant device suspended from the receiver.

The point of cut-off in the high-pressure cylinder is varied, to compensate for variations in the steam pressure, and to maintain a constant water pressure, by an automatic pressure regulator, which can be adjusted to maintain any desired water pressure within the limit.

The steam and water cylinders are tied together by heavy cast-iron frames of channel section, which are rigidly bolted at the ends with fitted bolts. The steam pistons are of the bull-ring and follower type, and are fitted each with two cast-iron packing rings of the "Wheelock" type.

The piston rods are of machinery steel,

permitting the crank and pin to rotate between them. The pump-end cross-heads are keyed to the plunger rods, which have taper fits in same.

The main crosshead wrist-pins are of open-hearth steel, and are fitted into the crosshead wrists on taper fits, are held in place by a nut and are prevented from possible turning by a feather.

The main connecting rods are of steel and are fitted with strap-gib and key-stub ends. The brasses are made of a composition of 88 per cent. copper, 10 per cent. tin and 2 per cent. zinc.

The crank pins are of crucible steel. They are forced into the cranks and are riveted over into the countersink on the back of crank. The main cranks are of cast iron, and are shrunk onto the main shaft and keyed in place with steel keys fitted on all four sides. The main shaft is forged from the best of-horseshoe scrap.

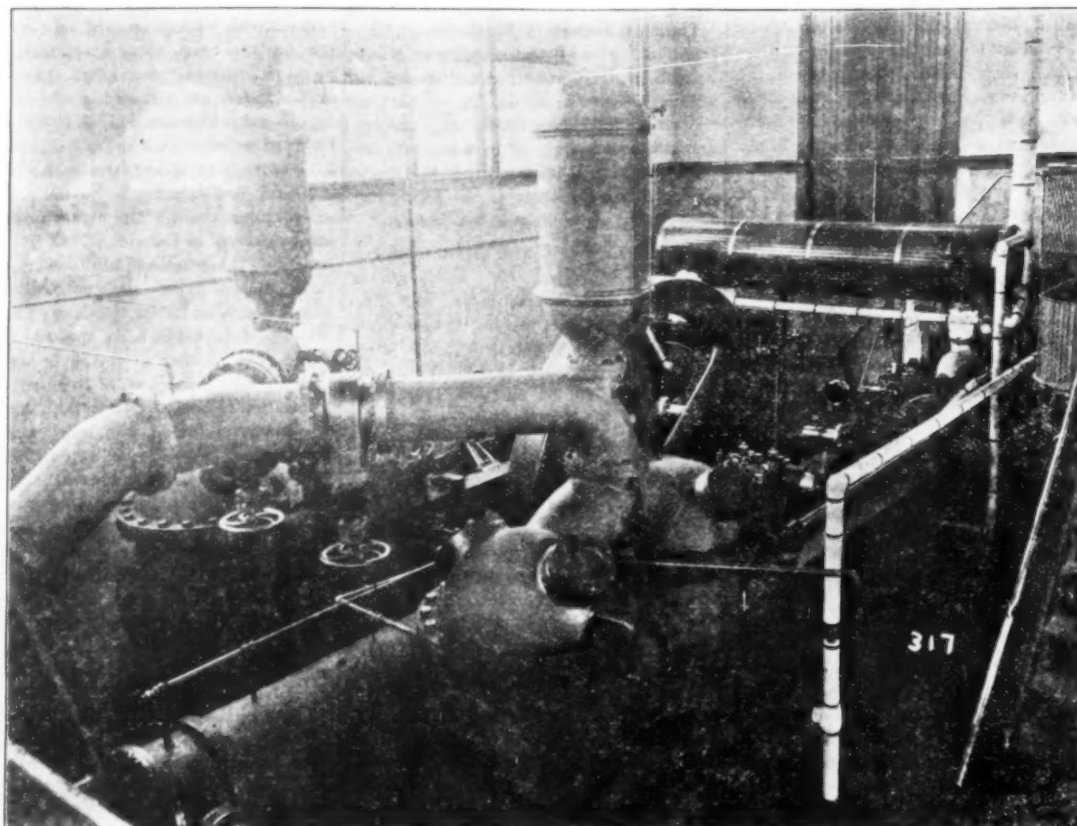
The main shaft journals are cast-iron quarter boxes and are babitted for the shaft bearings; the cheek pieces are adjusted by means of adjusting screws and are locked by lock nuts, which are pre-

the whole securely wired in place. All other heated pipes are covered with magnesia plaster.

The pump end is of a very neat and strong design, and on each side is made up of a large suction chamber, resting on and bolted to the foundation, two cylindrical-pump barrels, resting on and bolted to the suction chamber, and two spherical force chambers bolted to the barrels and connected together by curved nozzles for the cross delivery. A brass-lined plunger-ring is bolted between the two pump barrels, through which the plungers work.

The inboard barrels, on their inboard sides, are provided with removable stuffing boxes for the plunger rods, and have pads cast on for the joint with main frames. The outboard barrels are provided with heads for the removal of the plungers. Ample hand-holes are provided for access to the interior of the barrels and the force chambers.

The pump valves are discs of medium rubber. The valve seats are of composition, and are driven into the decks on a



DIRECT-SERVICE HIGH-DUTY PUMPING ENGINE.

and are fitted into the pistons and main crossheads with taper fits. They are secured to the pistons by bronze nuts, threaded six threads per inch, and to the crossheads by steel keys; they work through deep stuffing boxes, cast in the front cylinder heads, and are packed with "United States" metallic packing.

The crossheads are steel castings, fitted with upper and lower adjustable bronze gibs. Each crosshead is also provided with adjustable side gibs for taking up any lateral motion which might exist between the crosshead and guides. Each crosshead has two heavy arms, which stand out from it at an angle of forty-five degrees, each arm diametrically opposite to the other. These arms on the main crossheads are connected to the corresponding arms on the pump-end crossheads by cold-drawn steel crosshead rods three inches in diameter, which are fitted into the arms and keyed to them with steel keys. These rods, being set off the center lines at forty-five degrees, one of them passes the main crank at its rear and the other diagonally opposite, thus

vented from unscrewing by lock collars. These boxes are adjusted as required and are then held tightly in place by tightening down on the pillow-block cap nuts.

The fly-wheel is made in two pieces and is securely keyed to the main shaft.

The eccentrics are made in halves and are held in place on the shaft by steel set-screws. They are placed close to the inside faces of the pillow blocks to prevent the quarter boxes from shifting laterally.

The receiver is of cast iron and is placed over the steam cylinders and reaches across from the high-pressure side; it is supported by the pipes leading from it to the low-pressure cylinder on one end and by the high-pressure cross-steam pipe on the other end; it contains reheating pipes, through which live steam is circulated.

The steam cylinders and the receiver are neatly lagged with antique oak and are finished off with polished brass bands. The steam cylinders and the receiver are covered with one and one-quarter inches of magnesia next to the metal and a coat of hair felt one inch thick over magnesia,

taper and expanded below at two points. The valve guards are screwed into the seats on a taper, and are provided with a spring nut and a lock at their upper end for the removal of the valves. A metal plate is interposed between each valve and its spring.

The plungers are of hard cast iron, and are closed at their ends by water-tight joints, so that no water can leak into them. The inboard plunger heads have hubs into which the plunger rods are keyed. The plunger rods are of machinery steel.

The condenser is of the surface type, and is placed between the pump cylinders and piped in such a manner that as much of the suction water as is required to condense the steam can be deflected through the condenser.

The air pump is of the independent single direct-acting type. The pressure regulator is a piece of mechanism upon which patent is pending; it maintains a practically constant water pressure in the mains, and is therefore a very necessary feature.



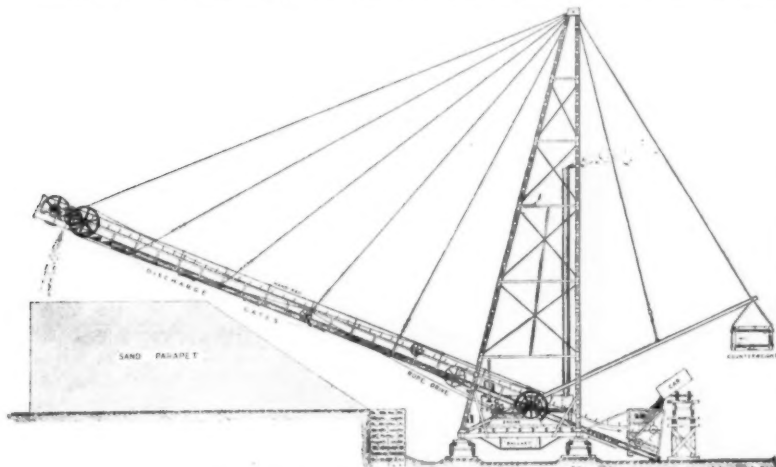
**Machinery for Building Fortifications**

Contract has been awarded to the Venable Construction Co., of Atlanta, for the construction of a large sand parapet at Key West for the United States government.

The equipment of machinery for economically and expeditiously completing

suspended from the floor beams of the tower, which also renders it proof against any tendency to sway in case of strong winds.

The entire machine is carried on tee-rail tracks by four-wheel trucks placed under the corners of the tower, and on these tracks it may be shifted to the positions necessary for it to assume to build



MACHINERY FOR BUILDING FORTIFICATIONS.

this work is shown in outline sketch in the accompanying illustration.

It is all contained in a vertical steel tower seventy-five feet high, and the two booms of steel construction guyed from the top of same. The boom to the left of the tower supports a conveyor 108 feet long. That to the right carries a box loaded with stone and sand weighing about 24,000 pounds—this as a counterpoise to the weight of the conveyor and its boom.

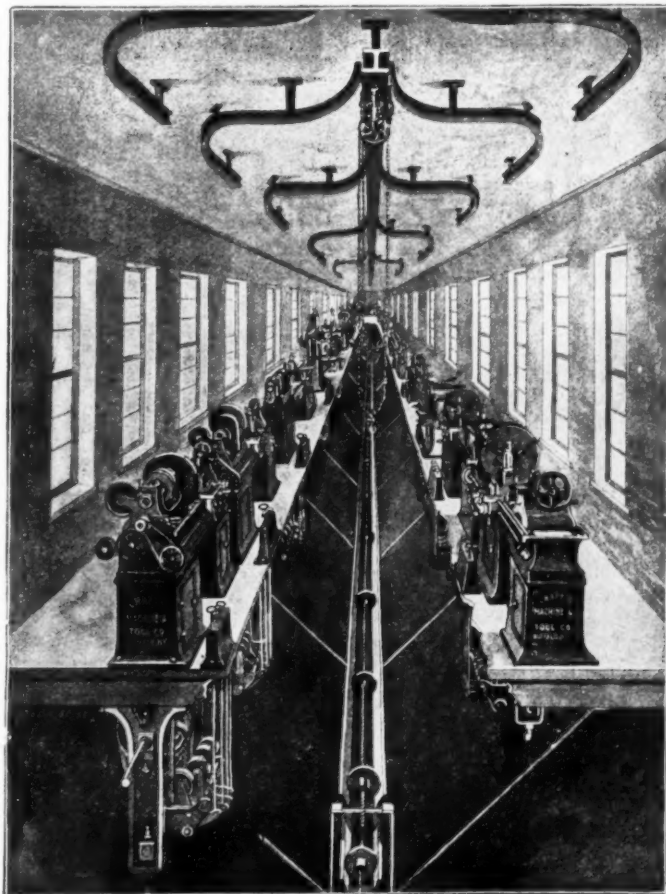
The sand, after being dredged from the sea, is brought in a plastic state to the steel receiving bin located above the foot of the conveyor. Cars of two and one-half cubic yards capacity bring the dredged material up an inclined trestle and drop it to the bin en masse. The bottom of the bin is hopper-shaped, and fitted with a regulating gate, so that the material will automatically and in the proper quantity feed itself to the conveyor. The sand is scraped along the trough of the conveyor by flights suspended from two strands of a rugged chain. The attachments which secure the flights to the chain not only serve as wearing shoes for these scrapers, but place the chains entirely outside of the conveyor trough, thus keeping them away from the sand.

The office of the conveyor is to place the coral mud so that it will form breastworks twenty feet high, fifty to sixty feet thick at the base and thirty feet at the top. To accomplish this, discharge doors are put at such intervals in the bottom of the conveyor trough as to make it possible to drop the material anywhere along the line of the sixty feet thickness referred to. These doors are readily opened and closed, and are easy of access, as is all the machinery of the conveyor, there being a footwalk along its entire length. The sand is deposited so that the thickness of the parapet is gradually decreased as the height is increased, till at the 20-foot summit it is about thirty feet thick.

Coral mud weighs approximately 2500 pounds per cubic yard. As two and one-half times this amount is dumped into the receiving bin at one time, and as the material at the rate of 135 tons per hour is discharged from the conveyor at any one of the trough doors, the equilibrium established in the unloaded machine might be disturbed by the varying weights thus put upon the two booms. To make perfect stability certain a stone and sand ballast box of 15,000 pounds capacity is

up, section by section, the 2000 feet of breastworks, the tracks running parallel with the line to be fortified. On the floor of the tower are placed the boiler and engine for driving the conveyor. The engine is a 40-horse, and power is transmitted to the head of the conveyor by means of a manilla rope drive, as shown by the sketch.

This outfit was designed and is being erected by the Link-Belt Engineering Co., of Nicetown, Philadelphia, Pa. While it will be the first plant installed by the



VARIABLE SPEED-CHANGING DEVICE.

company for the purpose, yet it is well within the wide range of its experience in designing and building elevating and conveying machinery and iron and steel structural work. Modern methods' catalogue, or vest-pocket edition, intended for superintendents and foremen, will be mailed on request.

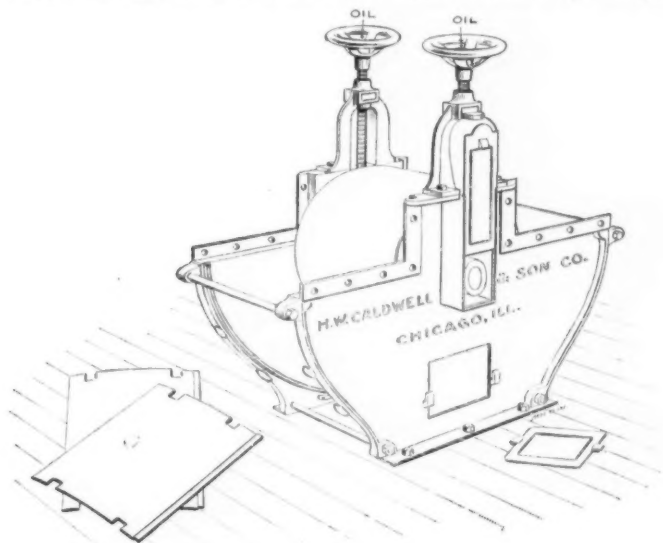
**Variable Speed-Changing Device.**

Managers of machine shops and iron works who are interested in modern appliances for quick and economical production of work are requested to direct their attention to the Crafts improved automatic variable speed-changing device, here illustrated, a device which is

tensive industrial establishments in the country have adopted this system, names of which will be readily given by the Crafts Company.

**New Design Elevator Boot.**

About mills, grain elevators and plants of similar character the boot at the foot of bucket elevator legs is generally



NEW DESIGN ELEVATOR BOOT.

applicable to any machine where change of speed is desired.

The illustration presents the system of driving iron-cutting machinery from below the floor, with trolley track and switches overhead and elevator below for carrying off chips, etc.

A further technical description regarding this device, and a statement of the

placed under the floor or below the ground level to facilitate spouting into the elevator. The accidents which occur to bucket elevators are many, such articles as coupling pins, chains, etc., finding their way into the elevator leg or boot; the buckets are torn from the belt and generally find their way into the boot, or the elevator chokes up and cannot be started again until the grain accumulated is cleaned out. The advantage of an elevator boot so designed that in the event of choke up the whole interior can be exposed to view and the stoppage easily removed, will be at once apparent. The illustration shows an elevator boot designed for the purpose of overcoming the difficulties mentioned. The cast-iron bottom pieces, forming the curved bottom of the boot, can be entirely removed without taking the whole frame of the boot apart. The cast-iron bottoms have along their edges gaps or spaces cut out of sufficient size to easily pass over retaining lugs cast in the frame of the boot. If it is desired to remove any one or all of the cast-iron bottoms, the cast-iron piece is lifted a short distance until the gaps are opposite the lugs and the section of the bottom is easily removed. To replace the section, the gaps pass by the lugs, and the bottom being dropped in place, is firmly retained by the lugs shown. In addition to the removable bottom pieces, hand holes are provided in the side to further assist in cleaning. Further points of excellence in the design illustrated are the hollow take-up rods for supplying oil, and the complete method of covering over the bearings so that the boot is practically dust-proof.

This design of boot is manufactured exclusively by the H. W. Caldwell & Son Co., 127-133 West Washington street, Chicago, Ill., which will be pleased to furnish prices on application.

**The Burr Safety Lift Block.**

A new rope block of interest to users of such appliances is herewith illustrated.

In this block are combined many of the advantages of chain blocks without the disadvantages of some of these. Fig. 1 shows the construction used on blocks of high power, or those having a ratio of 1 to 7.

Fig. 2 represents the safety lift with

Some of the most prominent and ex-

side plate removed, showing action of block when "open" and hoisting a load. When the rope is pulled to lift the load the rear end of the rock lever is pulled down, the sheave rocks, carrying the hoisting rope away from the lock, and the hoisting is done the same as with a common block.

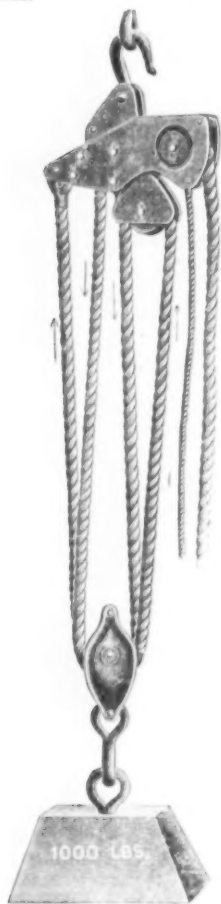


FIG. 1.

Fig. 3 shows the safety lift with side plate removed, showing action of block when "closed" or locked. The hoisting rope being released, the load pulls down the front arm of the lever, the sheave swings forward and clamps the rope against the lock, securely sustaining the

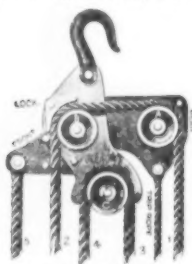


FIG. 2.—OPEN.

load at any point desired. The heavier the load the greater the pressure to hold the rope.

"Safety" lowering of load is effected by pulling slightly on the small "trip rope," or if that is not conveniently at hand, on the No. 4 strand of the hoisting

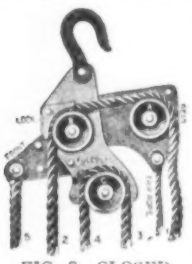


FIG. 3.—CLOSED.

rope. (Fig. 2 or 3). The load in this manner can be lowered with the accuracy and safety of a chain block, a matter of importance where the load is to be lowered just to a certain point, as is often required.

There is nothing in these blocks to wear or cut the rope, all parts coming in contact with the rope being perfectly smooth. Use even makes it work more perfectly.

These blocks are readily adjustable in power from a 1 to 2 ratio to a 1 to 7 by the use of the cross-sheave arrangement shown in Fig. 1. This is a particularly convenient matter where the loads to be handled vary greatly from light to heavy.

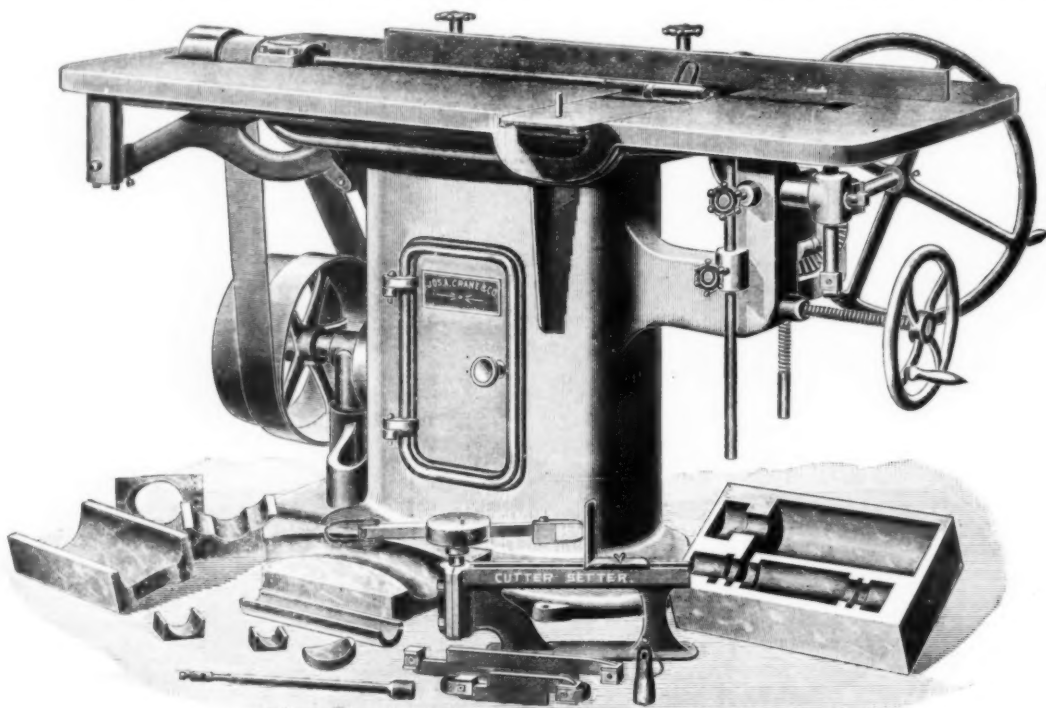
The manufacturer of these hoists is the Burr Manufacturing Co., 823 Society for Savings Building, Cleveland, Ohio. The Baltimore agent is Mr. E. C. Folger, of 202 Buchanan's wharf, who will be pleased to hear from prospective buyers in his city and contiguous territory.

#### Pattern and Core-Box Machine.

This machine is designed to facilitate the construction of patterns and core boxes. Its makers say it will groove a semi-circular core box (either straight or arch) perfectly true in a few minutes, where hours and sometimes days are required to accomplish the same work by hand. It is invaluable in pattern-making, as much exterior work can be formed accurately and quickly. Much of this work can be accomplished in less time than it would take to lay out the work and make templates. Core boxes made on the machine will permit the use of large cores, and nearer to finished dimensions, thereby saving greatly in the cost of machine work and the weight of castings.

It is also claimed that a great saving is made in the cost of material used in core boxes. Hand work requires costly, soft, straight-grain, clear stock, which is the only stock adapted to the use of gouge and plane, while with the machine knotty, hard or cross-grained stock can be used, and the surface left smooth and clean.

Frame is of one solid casting. Spindles are made of steel, and consist of main



PATTERN AND CORE-BOX MACHINE.

and small extension spindle, enabling operator to cut from three-quarter-inch to twenty-inch diameter any length required.

Self-oiling strap-box at cutter-head; countershaft is adjustable so as to keep belt at proper tension. Each machine is furnished with three steel cutter-heads and one large adjustable arm-head, with three sets of taper arms. All heads provided with full set of cutters. The extension arms are made taper to prevent outward slip when in motion. Weight, 1100 pounds; floor space, 56x36 inches. For

further information address the builders, Messrs. Joseph A. Crane & Co., 234 Mill street, Rochester, N. Y.

#### Portable Stove.

The device for a stove which is here presented is intended for the use of hunting, fishing, yachting and picnic parties,

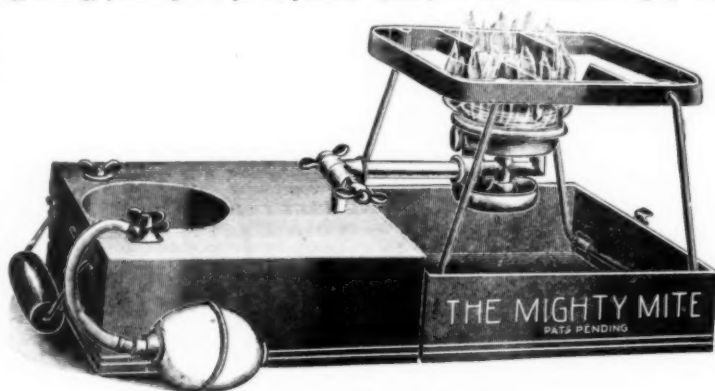


FIG. 1.

as well as for light housekeeping and for travelers.

The "Mighty Mite" stove folds into a box 7x7x3 3/4 inches, and, with a single burner, weighs but five pounds; the parts are brass, and cannot rust; the stove cannot be filled while burning, the cause of the great majority of accidents, as in removing the filler plug all the air escapes and the flame immediately goes out. It is safe, because the heat is due to the pressure; the flame is the hottest on any gasoline stove. An ordinary stove will boil a gallon of water in from ten to fifteen minutes; the "Mighty Mite" is claimed to do it in six minutes.

For any further information desired address the maker, the Mighty Mite Stove Co., Room 314 Northern Office Building, Chicago, Ill.

of Birmingham, Ala., is manager. This latter company will begin at once the operation of a coal mine, with a minimum capacity of 1000 tons daily, will construct several hundred ovens for the production of coke, and altogether will employ about 1000 men in the proposed developments.

The coal seam to be operated is a good quality of bituminous, averaging about

eight feet in thickness. Several workable veins are located on the property, but at present only the one referred to above will be worked. The mines and



FIG. 2.

ovens will be located at Horse Creek, Ala., six miles east of Cordova.

Mr. Herman Justi, chairman of the executive committee of the Tennessee in-

#### Coal and Coke in Alabama.

Mr. B. M. Long, of Cordova, Ala., has completed the sale of 11,000 acres of coal land to Northern capitalists, who will inaugurate immediate steps for the thorough development of the property.

The purchasers are Messrs. L. C. Mandeville, L. P. Mandeville, C. H. Stewart and Sid Holderness, of Carrollton, Ga., and these parties have sold a half interest in the land to the Ivey Coal & Coke Co., of which Mr. Walter Moon,

industrial convention, has opened headquarters in the Chamber of Commerce Building, Nashville, with a full corps of assistants, and will from now on keep the whole South advised of the progress of the movement for industrial development.

The New York Commercial makes the point that in the event of war the people of Florida may be among the heaviest sufferers through an interruption of the lumber industry, which employs many mills and many vessels.



## LUMBER.

[A complete record of new mills and building operations in the South will be found in the Construction Department.]

## LUMBER MARKET REVIEWS.

## Baltimore.

Office Manufacturers' Record,  
Baltimore, Md., April 14.

The local lumber market in nearly every avenue shows a slightly better tone and the favorable weather of the past week gives dealers a better chance for operating. While there is no urgent demand in any particular line, there is a steady business in progress, with a fair inquiry from local as well as out-of-town buyers. Receipts of yellow pine are moderate and stocks in their present state are sufficient to supply the demand of dealers and others. Air-dried yellow pine is selling freely at list figures and prices are about steady. In kiln-dried North Carolina yellow pine the movement is fairly active, with values firm, but not quotably higher. Cypress is steady, with stocks ample for present wants. White pine continues to move freely and the demand is better both from local and out-of-town buyers. In the hardwood market there is a good local inquiry, while from adjacent points there is also a good demand. The export movement in hardwoods shows no improvement and shipments during the month of March have been lighter than usual.

The following list represents the prices current at this date:

[The quotations for yellow pine are for cargo lots, and for all hardwoods the figures indicate values for choice car lots.]

VIRGINIA AND NORTH CAROLINA PINE		
5-4x10 No. 2, kiln dried.....	\$12 50	13 50
5-4x12 No. 2, kiln dried.....	14 00	15 00
4-4x10 No. 1, kiln dried.....	15 00	15 50
4-4x12 No. 1, kiln dried.....	15 00	16 00
4-4 nar. edge, No. 1, kiln dried	12 50	14 00
4-4 wide edge, No. 1, kiln dried	17 50	18 50
6-4x10 & 12, No. 1, kiln dried.	23 00	24 00
4-4 No. 1 edge floor, air dried.	12 00	13 00
4-4 No. 2 edge floor, air dried.	10 00	11 00
4-4 No. 1 12-in. stock, air dried	15 00	16 00
4-4 No. 2 12-in. stock.....	12 50	13 50
4-4 edge box or rough wide.....	8 00	8 50
4-4 edge box do. (ord. widths)...	7 50	8 00
4-4 12-in. rough.....	9 50	10 00
3/4 narrow edge.....	5 50	6 50
3/4 wide.....	6 50	7 50
3/4x9/4 and 10 1/4-in.....	7 50	8 50
Small joists, 2 1/2-12, 14 and 16	8 00	8 50
long.....	8 00	9 00
Large joists, 3-16 long and up	8 00	8 50
Scantling, 2x3, 2x4 and 3x4.....	7 50	8 50

WHITE PINE		
1st and 2d clear, 4-4, 5-4, 6-4	\$17 00	48 00
and 8-4.....	42 00	43 00
3d clear, 4-4, 5-4, 6-4 and 8-4.....	14 50	15 50
Good edge culls.....	16 50	17 50
Good stock.....	16 50	17 50

CYPRESS.		
4-4x6, No. 1.....	\$19 00	20 00
4-4x8, No. 2.....	13 00	14 00
4-4x6, 16 feet, fencing.....	10 00	11 00
4-4x6, rough.....	8 50	9 00
4-4 rough edge.....	8 00	8 50
4-4 edge, No. 1.....	16 00	17 00
4-4 edge, No. 2.....	12 00	13 00
Gulf, 4-4, Nos. 1 and 2.....	25 00	26 50
Gulf, 6-4, Nos. 1 and 2.....	28 00	30 00

HARDWOODS—WALNUT.		
5-8, Nos. 1 and 2.....	\$35 00	75 00
4-4, Nos. 1 and 2.....	80 00	90 00
5-4, 6-4 and 8-4.....	85 00	95 00
Newell stuff, clear of heart.....	85 00	100 00
Culls.....	20 00	30 00

OAK.		
Cabinet, white and red, Southern, plain-sawn and good, 1 and 2, 8 inches and up, 12 to 16 feet long, 4-4.....	\$30 00	34 00
Quartered white Western, 1 and 2 quality, all figured, 6 inches and up wide, 4-4.....	53 00	55 00
Culls.....	10 00	15 00

POPLAR.		
Nos. 1 and 2, 5-8.....	\$24 50	25 50
Nos. 1 and 2, 4-4.....	28 00	30 00
Nos. 1 and 2, 6 and 8-4.....	32 50	33 50
Culls.....	11 50	12 50

SHINGLES.		
Cyp. No. 1 h'rts, sawed, 6x20.....	\$6 50	7 25
No. 1 saps, sawed, 6x20.....	4 75	5 00
No. 1 hearts, shaved, 6x20.....	6 00	7 00
No. 1 saps, shaved, 6x20.....	4 75	—

LATHS.		
White pine.....	\$2 00	2 10
Spruce.....	2 10	2 15
Cypress.....	1 50	1 60

## Charleston.

[From our own Correspondent.]  
Charleston, S. C., April 11.

The demand for lumber and other wood products holds up remarkably well under all existing conditions, and the local market is fairly active, with the list of values not materially changed. Saw mills at outlying points are generally busy, and

have orders sufficient to keep them operating on full time. Shipments of lumber, shingles and crossties from Georgetown were of considerable volume during the month of March, and prospects are good for an average run of business during the spring months. On Saturday the market closed firm for all desirable grades of lumber as follows: Merchantable, \$14 to \$16 for city-sawn, \$12 to \$14 for railroad; square and sound, \$9 to \$13 for railroad, \$8 to \$11 for raft; dock timber, \$4.50 to \$6.50; shipping, \$8.50 to \$10.50. There is a good demand for shingles at \$4 to \$7 per thousand. During the past week the following shipments were reported: For New York schooners Margaret B. Roper with 350,000 feet of lumber, and Bessie Whiting with 441,000 feet; barkentine E. S. Powell with 467,200 feet, and by steamer 92,210 feet; schooner Lander V. Beebe cleared for Boston with 549,696 feet of lumber, and Josephine Elliot with 396,000 feet. The total clearances of wood products from this port from September 1, 1897, to April 8, 1898, were 31,945,800 feet of lumber coastwise and 559,000 feet foreign, making a total of 32,504,800 feet, against 36,216,000 feet for the corresponding period last year. Lumber rates are generally firmer, under a better inquiry. Lumber to New York is quoted at \$4.38 to \$4.50; wet ties to Perth Amboy, 15 cents each, basis forty-six feet; switch ties, \$3.75, and lumber, \$4.50; dry railroad ties to New York, 11 1/4 cents, basis thirty-six feet; lumber to Fall River, \$4.50. The schooner W. M. Oler was chartered last week in New York to load crossties here for Boston at 15 1/2 cents.

## Savannah.

[From our own Correspondent.]  
Savannah, Ga., April 11.

The business of this port during the month of March showed a marked increase in volume over the corresponding month last year, and so far during the present month a steady gain in exports is being recorded. The lumber and timber industry is at the moment in a more healthy condition, and the demand active, the exports for the month of March including foreign and coastwise amounting to 14,133,343 feet, against 12,955,428 feet a year ago. The movement in crossties is also of a satisfactory character, the demand from railroads being unusually good for this period of the season. At all milling sections along the lines of railroad entering this city there is considerable activity among saw mills, nearly all being well supplied with orders. Prices for all desirable grades of lumber are generally firm, but not quotably higher. Manufacturers and others engaged in the trade are generally firm in their views, and hold their stocks for outside figures. There is more lumber going into consumption for local purposes than usual, the building trade absorbing large lots for immediate use. The number of building permits issued for March showed an increase, and all indications point to an active spring building season. Among the clearances during the week were the following: Schooner Annie C. Bailey for Philadelphia with 308,680 feet of pitch-pine lumber. Boston steamers cleared with 124,000 feet of lumber, Baltimore steamers with 458,000 feet, and New York steamers with 506,896 feet. The schooner Rebecca F. Lamdin cleared for Baltimore with 368,305 feet of pitch-pine lumber from the Georgia Lumber Co. Among the charters reported in New York were the following: A British ship, 1453 tons, from Savannah to Santos with lumber at \$14, and a schooner from Brunswick to New York with lumber and ties on private terms. Freight

on lumber and timber are firm at ruling rates. The rates from this and nearby ports of Georgia are quoted at \$4 to \$4.50 for a range including Baltimore and Portland, Me.; railroad ties, basis forty-four feet, to Baltimore, 12 cents; to Philadelphia, 13 cents, and to New York, 13 1/2 cents. Steamer rates on lumber are quoted at \$5 to New York, \$5.50 to Philadelphia via New York, \$6 to Boston and \$4 to Baltimore.

## Mobile.

[From our own Correspondent.]  
Mobile, Ala., April 11.

The present month bids fair to show a much larger volume of business in lumber and timber than March, and at the moment considerable activity prevails in nearly every department of this industry. Considerable timber was handled last week, some 355,138 cubic feet of sawn and 14,169 cubic feet of hewn timber having been shipped to Great Britain. Prices continue about steady at 9 1/2 to 10 cents per cubic foot for sawn timber, and 12 to 12 1/2 cents for hewn. Cypress, ash, cedar and other timbers are unchanged. The clearances reported for the week are as follows: Ship Austin for Belfast with 101,598 cubic feet of sawn timber, 14,169 cubic feet of hewn timber and 28,144 feet of lumber; ship Burrell for Greenock, Scotland, with 92,990 cubic feet of sawn timber and 26,327 feet of lumber; ship America for the same port with 80,356 cubic feet of sawn timber and 20,074 feet of lumber; bark Adolph for Wiesbach with 3580 cubic feet of sawn timber and 331,581 feet of lumber, and bark Eastern Light for Fleetwood, England, with 76,065 cubic feet of sawn timber and 9972 feet of lumber. There is a good demand for lumber from South America; the brig Ohio cleared for Rosario, A. R., with 286,323 feet, and the bark Costagliola with 442,016 feet. The schooner Smith cleared for Ruman, S. H., with 10,000 feet of lumber, and steamer Hellos for Tampico, Mexico, with 127,000 feet. The total clearances of lumber from September 1, 1897, to date amounts to 34,597,758 feet, against 41,350,168 feet for the corresponding period last year. Among the charters reported in New York last week were the following: Steamer Kerrimoor, 2106 tons, from Pensacola or Mobile to Greenock with sawn timber at 110/6, or Hull 111/3; British steamer Roddam, 1506 tons, from Pensacola to Greenock with sawn timber at 110/6; Norwegian bark Johan Irgens, 748 tons, from Ship Island to Cardiff with sawn timber at 102/6, and bark Ameer, 723 tons, from Apalachicola to the United Kingdom or Continent with sawn timber at 107/6. The Italian bark Sicilian, 712 tons, was chartered to load at Pensacola with sawn timber for Marseilles at 99/6, and the bark Elkunda-sund, 797 tons, with sawn timber for Calais at 103/9.

## St. Louis.

[From our own Correspondent.]  
St. Louis, Mo., April 11.

The volume of trade in the various departments of the lumber market shows very little expansion and the business of the past week has been a trifle less than usual. Indications point to a lull in trade, as orders are not as numerous and are generally for smaller quantities of stock. In the yellow-pine business the demand is not so pronounced, but there is, however, a fair volume of transactions recorded. Stocks are generally light at all the mills and prices hold remarkably firm for all desirable material. The St. Louis Lumbermen's Exchange gives a statement of the lumber movement in and out of the city for the first quarter of the present year, which is a good showing, and

is a fair index of the prosperous tone of the lumber industry. The receipts by rail show a gain of 5656 cars, and by month the receipts were as follows: January 5069 cars, February 5519 cars, March 6913 cars, or a total of 17,531 cars, against 11,875 cars for the corresponding quarter last year. Receipts by river were: January 499,000 feet, February 2,014,000 feet, March 3,064,000 feet, making a total of 5,577,000 feet, against 4,363,000 feet last year. The shipments in January were 2607 cars, February 2707 cars and March 3767 cars, or a total of 9081 cars, against 7082 cars for the corresponding quarter in 1897, a gain of 1999 cars. The situation in hardwoods is more satisfactory than in yellow pine, and there is a good demand from carbuilding companies, furniture factories and other woodworking concerns. Oak is selling freely, and all varieties and qualities are moving in considerable volume. Stocks of poplar are not excessive and the bulk of the river receipts are squares, while the yards are buying all they can get. Poplar boards and plank are moving freely, with a good demand for all grades. Prices for all hardwoods are generally firm, with an advancing tendency.

## Lumber Notes.

A charter was granted last week to the Farmers' Lumber Co., of Spicard, Mo., with a capital stock of \$5000. The incorporators are T. S. Evans, Adam Breigle, John Speck and others.

The schooner Ann J. Trainor cleared last week from Fernandina, Fla., for New York with a full cargo of cypress lumber, and schooner D. D. Haskell for the same port with 265,000 feet of yellow-pine lumber.

Rippetoe Bros., of Belva, W. Va., are operating a large saw mill at that place, and are shipping on an average over 100,000 feet of lumber a month. They employ fifty men, and own fifteen miles of railroad.

It is stated that over 3,000,000 feet of lumber will be required in the construction of the new 500,000-bushel grain elevator at Port Arthur, Texas. The Barnett & Record Co., of Minneapolis, has the contract to construct the elevator.

The Nebraska Lumber Co.'s lands, timber, tramroad and other effects, recently purchased by George M. Dilly & Son and others, of Colmesneil, Texas, has been sold to William McCready, of Doucette, who will erect a new mill with a capacity of 40,000 feet a day.

It is stated that E. F. Smith and A. W. Spencer have about completed arrangements to put in operation another veneering factory in Johnson City, Tenn. The new concern will be known as the Johnson City Veneer Mills, and will manufacture all grades and thicknesses of veneering.

Mr. Henry Dunkort, of Cincinnati, O., has leased a building, with power, at Buena Vista, Va., and will put in equipment of machinery for the production of parquet strips from hardwood. This stock is to be made expressly for export trade and will be sent to Newport News for shipment abroad.

Mr. W. C. Stiles, of Warren, Ohio, contemplates locating a chair-stock factory in the South, and has recently visited several sections looking for an available site. No definite conclusion has been reached as to location as yet. Oak, birch, maple and beech timber will be wanted in abundance at the site of the plant.

Secretary Delavigne, of the New Orleans Mechanics, Dealers and Lumbermen's Exchange, reports the receipts of wood products at that port for

the week ending April 8 as follows: Lumber 1,126,000 feet, oak staves 31,910 and cypress staves 15,200. The total receipts of lumber for the season amounted to 49,604,200 feet, against 45,987,000 feet last year.

A fire occurred at the North Carolina Lumber Co.'s mills at Tillery, N. C., on the 8th inst., in which the dry-kilns were entirely consumed, together with a large quantity of lumber. The mills and other sections of the plant were saved. The plant is fully covered by insurance. It is expected that operations will be resumed again after a suspension of about thirty days in order to repair damage.

A steady stream of log rafts from the upper tributaries of the Tennessee river arrived at Chattanooga last week. The Loomis & Hart Manufacturing Co. received over 200 rafts of poplar and oak logs. Snodgrass & Field received over 100 rafts, and expect 200 more on the rise. Blair & Talliferro received a big fleet containing 300,000 logs. It is said to be the best "log tide" known in five years.

The following clearances were reported from Brunswick, Ga., last week: Schooner Laura for New York with a cargo of crossties from Baxter & Co.; schooner Almada for New York with a cargo of lumber from N. Gergersten; schooner Willie L. Newton for Philadelphia with a cargo of lumber from the Hilton-Dodge Lumber Co., and schooner J. W. Belano for Boston with a cargo of lumber from the Southern Pine Co.

Among the clearances of wood products from Pensacola, Fla., last week the following vessels were reported: Bark Hauzesund for Newport, South Wales, with 733,272 feet of sawn timber and 41,718 feet of lumber; bark Orion for London with 836,882 feet of lumber; bark Loretto for Genoa with 459,924 feet of timber, and Italian ship Indus for Leghorn with 810,972 feet of timber and 41,501 feet of lumber.

Mr. C. S. Searing, of Shreveport, La., sold last week to Messrs. W. A. Pickering & Co., of Springfield, Mo., 22,000 acres of the finest long-leaf pine. The price paid is said to be about \$15 per acre. The tract is located just south of Leesville, along the line of the Kansas City, Pittsburg & Gulf Railroad. Messrs. Pickering will erect upon the land a mammoth saw mill, with a daily capacity of 125,000 feet. Part of the machinery for their plant has been purchased, and arrangements will be made in a few days for the balance.

Considerable activity prevailed last week in lumber circles at Jacksonville, Fla., and shipments were larger than usual. The following clearances were reported: Clyde steamer Comanche for New York with 190,000 feet of lumber, 3200 bundles of shingles, 3000 railroad ties and other cargo; the steamer Algonquin took out 300,000 feet of lumber, 4000 crossties and 1000 bundles of shingles, and schooners cleared for New York with over 1,500,000 feet of lumber; the schooner Celia F. cleared for Providence with 315,000 feet of lumber; schooner Charles F. Walston for Perth Amboy with 281,000 feet, and schooner Thomas Winsmore for Philadelphia with 320,000 feet; the steamer George W. Clyde cleared for Boston with 300,000 feet of lumber and 2500 bundles of shingles, and the schooner Mary A. Hall for the same port with 325,000 feet of lumber.

The interest manifested and encouraged by the press of Tennessee in the industrial convention will be increased by the publication of syndicate letters setting forth its purposes.

## PHOSPHATES.

### Phosphate Markets.

Office Manufacturers' Record,  
Baltimore, Md., April 14.

In sympathy with the fair activity and firmness in the market for other fertilizer ingredients phosphate rock in the local market is generally very steady, with an improvement in the volume of business. The domestic demand for nearly all descriptions is fair and at all points of production there is a marked improvement in development. South Carolina miners are increasing their output very materially and coastwise shipments from Charleston are increasing. There is also a good demand for Tennessee rock and at Mount Pleasant there is unusual activity among miners. Prices have advanced slightly and sales to the amount of about 10,000 tons of Tennessee phosphate have been made by Baltimore brokers during the past thirty days. The movement in phosphate rock from the Florida ports continues fairly active, especially from Fernandina, at which port the shipments indicate an increased volume compared to the exports for March. The following charters were reported in New York last week: A Norwegian steamer, 1045 tons, from a Southern port to the United Kingdom with phosphate rock on private terms; British steamer James Turpie, 1082 tons, from Fernandina to Kastrup with phosphate rock at 17s. 10½d., April-May; schooner F. C. Holden, 113 tons, from Cartaret to Boston with fertilizer at \$1.10, and schooner H. L. Baker, 720 tons, from Cartaret to Wilmington with fertilizer at 45 cents.

### Fertilizer Ingredients.

In the market for ammoniated the tone is fairly active, with the list of values firm under a good Eastern demand for nearly all descriptions. Reduced stocks in the West have stiffened prices for dried blood and tankage, large sales of which are reported to Southern buyers. Values are slightly easier on sulphate of ammonia, but spot lots at the close were about steady. Nitrate of soda is firm for spot, but distant deliveries are somewhat neglected.

The following table represents the prices current at this date:

Sulphate of ammonia (gas)	\$2 45 @	1 80
Nitrate of soda	1 75 @	1 75 @
Blood	1 72½ @	1 65 @
Hoof meal	1 65 @	1 77½ @
Azotine (beef)	1 77½ @	1 67½ @
Azotine (pork)	1 77½ @	1 75 and 10
Tankage (concentrated)	1 67½ @	15 00 @ 15 50
Tankage (9 and 20)	1 75 @	20 00 @
Tankage (7 and 30)	15 00 @	12 00 @
Fish (dry)	20 00 @	
Fish (acid)	12 00 @	

### Phosphate and Fertilizer Notes.

The steamship King Arthur arrived in Fernandina, Fla., on Monday, the 4th inst., at 2 P. M., and loaded 1360 tons of phosphate rock from the Dunnellon Phosphate Co. She cleared and sailed at 2.30 P. M. on the 5th inst., being in port only twenty-four hours. The steamer Airdra-shaig, with 2400 tons of phosphate rock, and steamer Linwood, with 2530 tons, cleared last week for Rotterdam.

The following shipments of phosphate rock were reported by Messrs. J. M. Lang & Co. from the port of Savannah for the month of March: Steamer Hindostan for Hamburg with 1820 tons; steamer Home-wood for Genoa with 304 tons; steamer Glenmorven for Stettin with 2000 tons, and steamer Frankby for Genoa with 1350 tons, making a total of 5474 tons. The steamer Inverness cleared last week for Gothenburg with 1507 tons of phosphate rock among her cargo.

The demand for South Carolina phosphate rock is at present better than for some time past, and shipments each week show a steady increase in volume. For

the week ending the 8th inst. the following clearances from Charleston were reported: Schooner Isaac T. Campbell for Weymouth, Mass., 900 tons; schooner Edgar C. Ross, 600 tons, and schooners James W. Bigelow, 770 tons, S. B. Martiz, 843 tons, and Susie H. Davidson, 850 tons, all for Baltimore. The total domestic shipments from the port of Charleston from September 1, 1897, to April 8, 1898, amounted to 62,959 tons, against 58,352 tons for the corresponding period last year.

### Iron Markets.

Cincinnati, Ohio, April 9.

The flood that afflicted the Ohio valley has receded, and the foundries and mills affected have been able to resume operations.

The gathering war clouds have not cast serious shadows upon the iron industries of the country as yet, and the trend of trade continues normal. The manufacturers, as a rule, are in active operation, and are not alarmed over the possibilities of war, many feeling that the conflict, should it come, will not be protracted, and that the country will emerge from it with increased prestige and power.

The sales of the week have been numerous, and comprehend about every variety of iron. Though the orders have not been for large quantities, several have been for scattered forward deliveries, evidencing confidence in the future.

Prices remain unchanged.

We quote for cash f. o. b. Cincinnati:

Southern coke, No. 1 foundry	\$9 75 @ \$10 00
Southern coke, No. 2 foundry	9 50 @ 9 75
Southern coke, No. 3 foundry	9 25 @ 9 45
Southern coke, gray forge	8 75 @ 9 00
Southern coke, mottled	8 75 @ 9 00
Southern coke, No. 1 soft	9 75 @ 10 00
Southern coke, No. 2 soft	9 50 @ 9 75
Belfont coke, No. 1 Lake Sup.	11 00 @ 11 50
Belfont coke, No. 2 Lake Sup.	10 50 @ 10 75
Hanging Rock charcoal, No. 1	14 50 @ 15 50
Tennessee charcoal, No. 1	12 50 @ 13 00
Jackson Co. silvery No. 1	12 00 @ 12 50
Standard Georgia car-wheel	14 25 @ 15 00

Philadelphia, Pa., April 9.

Nice run of orders for charcoal iron this week, caused mostly by requisitions given out by the government. In addition to this, considerable coke iron in both mill and foundry grades has changed hands, the orders coming from a widely-scattered territory.

We quote for cash f. o. b. Philadelphia docks:

No. 1 X standard Alabama	— @ \$11 00
No. 2 X standard Alabama	— @ 10 55
No. 1 X lake ore coke iron	— @ 11 75
No. 2 X lake ore coke iron	— @ 11 25
Lake Superior charcoal	— @ 13 25
Standard Georgia C. C.	— @ 15 50

New York, N. Y., April 9.

At the writing of this report the relations between this country and Spain are at the most acute stage, and it is altogether natural that there should be little going on in the iron market in the way of new business. There have been no cancellations of orders reported, and with the exception of one contract, in which the privilege of cancellation in the event of war was incorporated, we have heard of no instance in which the war subject has had a direct bearing on current business. Indirectly its effect is felt in the checking of new undertakings and the restriction of loans. The market for iron has always been peculiarly sensitive to these two influences.

There is no diminution of shipments, which are going on at a heavier rate than ever before at this season of the year. The belief of the best-informed and most experienced observers in the trade is that with the incubus of war talk removed, and settled conditions assured, we should enter upon an era of great activity that will not soon be interrupted. We make no change in quotations.

We quote for cash f. o. b. New York:

No. 1 X standard Alabama	\$10 75 @ 11 00
No. 2 X standard Alabama	10 50 @ 10 75
No. 1 X lake ore coke iron	12 50 @ 12 75
No. 2 lake ore coke iron	12 00 @ 12 25
Niagara coke malleable	12 00 @ 12 25

Rome (Ga.) charcoal..... 15 00 @ 15 50  
Hinkle L. S. charcoal..... 13 00 @ 13 50  
ROGERS, BROWN & CO.

### Profits of Meat Packing.

In a number of issues the Manufacturers' Record has referred to the success which could be made by meat packing in the South, when conducted properly and economically. The packing-house at Augusta, Ga., has been referred to in this connection. At Dalton, Ga., Davis & Sons packed and sold hams, sausages, kettle-rendered lard and other products of like character to the amount of \$10,000 in the month of February just past. Only a few years ago this firm was not doing one-tenth of the business they now do. Next year, it is stated, they will increase their cold-storage plant, double their steam-power and very nearly double the number of kettles and machines, and they will undoubtedly more than double the output of their slaughter-houses.

### Literary Notes.

Coal Catechism. By Wm. Jasper Nicolls. J. B. Lippincott Co., Philadelphia and London. Price \$1.50.

This publication is intended for intelligent readers who have no technical training, and who may have neither the time nor the inclination to read voluminous geological and statistical reports of the coal industry, or to study the ponderous volumes of technical experts. In twenty chapters are treated such topics as "Origin of Coal," "Prospecting," "Development," "Operating," "Hauling," "Rail and Water Transportation," "Heat," "Power," "Gas," "Coke" and the "By-products of Coal." The language is attractive in its simplicity, and the book will be of value not only to young students in schools and colleges, but as a reference book for general readers.

Seven works of fiction published in 1897 were recently selected in New York as worthy of permanent shelf room in public libraries. Of these seven first-rate novels three were first published serially, and of the three, two—and they much the most notable ones in the entire list, being Kipling's "Captains Courageous" and Stevenson's "St. Ives"—were published in McClure's Magazine.

Mr. James Maccabe, representing the Liverpool Salvage Association, of Liverpool, England, who has recently visited New Orleans advocating improved methods of storing and shipping cotton, has visited Galveston on the same errand. Mr. Maccabe has succeeded in interesting a number of prominent cotton shippers and dealers in the latter city. He considers, however, that Galveston has superior facilities for keeping cotton in good condition, owing to the plan of its storage warehouses and sheds.

Contracts will be awarded in Baltimore, Md., May 11 and 13 for tobacco for the French government. Bids are being asked for 4,000,000 kilos, or about 12,000 hogsheads, of Maryland tobacco, 300,000 kilos, or about 400 hogsheads, of Virginia tobacco, 1,000,000 kilos, or about 2000 hogsheads, of Kentucky (burley) tobacco, and 4,400,000 kilos, or about 6700 hogsheads, of other Kentucky tobacco. The total of the contracts will amount to about 21,100 hogsheads. Last year's contracts amounted to 18,550 hogsheads.

The New York Commercial is publishing special articles relating to the trip of the members of the National Association of Manufacturers to Caracas for the opening of the American warehouse there.

There is continued opposition in Louisiana to the creation of a railroad commission by the constitutional convention.



# CONSTRUCTION DEPARTMENT.

**THE MANUFACTURERS' RECORD** seeks to verify every item reported in its Construction Department by a full investigation and complete correspondence with everyone interested. But it is often impossible to do this before the item must be printed, or else lose its value as news. In such cases the statements are always made as "rumored" or "reported," and not as positive items of news. If our readers will note these points they will see the necessity of the discrimination, and they will avoid accepting as a certainty matters that we explicitly state are "reports" or "rumors" only. We are always glad to have our attention called to any errors that may occur.

\*Means machinery, proposals or supplies are wanted, particulars of which will be found under head of "Machinery Wanted."

In correspondence relating to matters reported in this paper, it will be of advantage to all concerned if it is stated that the information was gained from the Manufacturers' Record.

It often occurs that the organization of a new company in any town is not known by the postmaster, and hence letters addressed to the company are returned marked "not known." The Manufacturers' Record reports the first organization of all companies, and our readers, in seeking to get into communication with them, should be very careful in deciding how to address them, and even then they must expect the return of some letters, because of the lack of knowledge on the part of postmasters of all new companies. Criticisms and complaints are invited, as they will the better enable us to guard against errors.

## ALABAMA.

**Birmingham—Coal Mines.**—The Pioneer Mining & Manufacturing Co. has purchased the Morrow Mining Co.'s coal lands and opened mines and will fully develop same.

**Birmingham—Gas Plant.**—The Birmingham Gas Co. will make extensive improvements to its plant, as recently noted; contract has been awarded for the erection of a double-lift, steel tank gas-holder, capacity 200,000 feet; a considerable amount of piping will be laid and several lines of mains will be relaid; about \$25,000 will be expended.

**Cordova—Coal Mine.**—B. M. Long will open a coal mine on 4000 acres of land near Cordova.

**Courtland—Cotton Mill.**—P. M. DuBose, L. G. Hall, H. D. Bynum and others are endeavoring to organize a company to build a \$25,000 cotton mill.

**Decatur—Brick Works.**—Incorporated: The Tennessee River Brick Manufacturing Co., with Neely M. Pride, president; A. W. Sharpley, secretary and treasurer, and B. M. Nelson, manager. The capital stock is \$25,000. A majority of the stock taken is held by Michigan investors. The company now has a plant nearly completed; capacity 25,000 per day.

**Horse Creek—Coal Mining, Coke Ovens, etc.**—B. M. Long, of Cordova, writes regarding the coal land sale which he made to Southern capitalists, as noted last week. The property comprises 11,000 acres of coal land in Walker county, and the purchasers are L. C. Mandeville, L. P. Mandeville, C. H. Stewart and Sid Holderness, of Carrollton, Ga. These parties have sold a half interest in the land to the Ivy Leaf Coal & Coke Co., Walter Moon, of Birmingham, manager, and the company will begin at once mining 1000 tons of coal daily, erect several hundred coke ovens, employ 1000 men, etc. For further information address Sid Holderness, Carrollton, Ga., or Walter Moon, Birmingham, Ala.

**Tuscaloosa—Ice Factory.**—The Tuscaloosa Electric Light Co. has awarded contract for the installation of a 20-ton ice machine.

## FLORIDA.

**Arcadia—Street Improvements.**—The city will vote upon \$3000 for street improvements.

**Florida—Sugar Factory, etc.**—Thomas F. Shingledecker, of New Castle, Pa., and associates, who have purchased lands in Florida, expect to erect sugar factory, etc.

## GEORGIA.

**Atlanta—Viaduct.**—Contract for the construction of the steel viaduct to be built by the city and the railroads has been awarded to Grant Wilkins, of Atlanta, at \$47,598; contract for masonry and abutment work to Gude & Walker, of Atlanta, at \$18,928.50.

**Atlanta—Boot and Shoe Factory.**—Arrangements have been completed for the establishment of a boot and shoe factory by a Chicago company, to employ between 800 and 1000 hands. Site for the buildings to be erected has been purchased for \$100,000 through W. B. McBride, of Chicago, Ill., and a structure eight stories high, 150x125 feet, will be built after plans which have been completed by G. L. Normann. The building will cost \$400,000.

**Calhoun—Water Works.**—The contract for the construction of the water works, for which \$12,000 in bonds was voted recently, will be awarded April 20; W. L. Hillhouse, mayor.\*

**Cartersville—Carriage Factory, etc.**—Jno. W. Jones and H. E. F. Jones have incorporated the Jones Carriage Co., capital stock \$10,000, to manufacture, repair and deal in carriages.

**Cedartown—Cotton Mill.**—The Cedartown Cotton Manufacturing Co. contemplates the erection of another 1000-spindle mill; Charles Adamson, manager.

**Covington—Electric Light Plant.**—The Electric Supply & Construction Co., of Savannah, Ga. (20 Dayton street), has contract for constructing \$12,000 electric-light plant for the city.

**Dalton—Packing-house, etc.**—Davis & Sons may double their steam-power and cold-storage plant and meat-packing department.

**Lumpkin—Water Works.**—The construction of water works is probable. An election will be called to vote on a bond issue.

## KENTUCKY.

**Beattyville—Lumber Company.**—Incorporated: The Beattyville Lumber Co., capital stock \$3000, by G. W. Gourley and Ira Stratton.

**Clinton—Water and Light Plants.**—The Clinton Water & Light Co. is now preparing to consider bids for the construction of its water and lighting plants, on which about \$12,000 is to be expended. Sanders & Porter, of Louisville, Ky., are preparing plans and specifications.

**Letchfield—Mercantile.**—The Mercantile Co. has been incorporated, with a capital stock of \$28,000, and R. J. Bassett, president; E. Bailey Tilford, treasurer, and R. O. Cannon, secretary.

**Louisville—Bridge.**—The fiscal court has authorized the expenditure of \$2500 for bridge (steel) at Fishersville. Address Judge Gregory, of the court.

**Louisville—Stove and Range Foundry.**—The O. K. Stove & Range Co. will rebuild its foundry, destroyed at a loss of \$50,000.

**Louisville.**—Incorporated: The Mecca Co., capital stock \$2500, by D. L. Bailey and F. M. Richards.

**Louisville—Manufacturing Plant.**—A large manufacturing plant will be removed to Louisville as soon as a suitable site is secured. The secretary Commercial Club, 201 Equitable Building, can give information.

**Mayfield—Woolen Mill.**—The Mayfield Woolen Mills are reported to have ordered machinery to double the plant.

**Uniontown—Oil Wells.**—A. C. Chapman will drill for oil.

## LOUISIANA.

**Baton Rouge—Moss Ginnery.**—Hubert Wax has established a steam moss ginnery.

**Glenmora—Saw Mills.**—Dr. J. T. Phillips and W. B. Spencer will build a saw mill at Glenmora, capacity to be 40,000 feet daily, and a newly purchased tract of 2000 acres of timber land will be developed. Address Dr. Phillips, at Alexandria, La.

**Lafayette—Cotton Compress.**—Lehman, Stern & Co. propose the construction of a

cotton compress; address of firm, New Orleans.

**Monroe—Foundry and Machine Works.**—George Lemoine and J. W. Wright propose to organize a stock company for the purpose of erecting machine shops and iron foundry.

**New Orleans—Ice and Cold-storage Plant.**—The Central Ice & Cold Storage Co. will arrange at once for the construction of its ice factory and cold-storage plant.

**New Orleans—Knitting Mill.**—The Aiden Knitting Co. will establish an addition for carding and spinning cotton and put in twenty-four new knitting machines.

**St. Bernard Parish—Sugar Factory, Sugar Cultivation, etc.**—The Kenilworth estate, of London, England, Quinton Hogg, representative, now visiting New Orleans, has purchased for \$200,000 a tract of 5000 acres of sugar lands in St. Bernard parish. The property will be extensively developed, sugar-cane being cultivated and a \$350,000 sugar factory erected; about \$200,000 will also be expended on other improvements. Charles Godchaux, of New Orleans, La., is American representative of the estate and can be addressed, or address Quinton Hogg, care of Charles Godchaux.

## MARYLAND.

**Baltimore—College.**—Strayer's Business College was incorporated by S. Irving Strayer, Ceccey Mystal Strayer, Cora S. Bell, Anna Groscup and B. Pearl McCready; capital stock is \$5000.

**Centerville—Cannery and Shirt Factory.**—Business Men's Association is forming a company to establish cannery and shirt factory.

**Hagerstown—Sewerage System.**—It is probable that efforts will be made for the construction of a new sewerage system. Address the mayor.

**Oakland—Coal Mines.**—F. M. Devore and Alex. C. Hessen, of Oakland, have leased the Wood farm, near Oakland, and will open coal mines.

**Oakland—Water Works.**—The Mountain Lake Park Association has granted L. T. Yoder, of Pittsburgh, Pa., a franchise for the construction of a system of water works. A large steel tube will be sunk into the earth, into which the water will accumulate from a spring. A pumping engine will force the water to a standpipe to be erected, from which the water will be distributed by gravitation. The standpipe of steel, 30,000 gallons capacity, will be built on a foundation of masonry, and will be erected so an additional section, bringing the capacity to 90,000 gallons, can be added.

## MISSISSIPPI.

**Jackson—Oil Mill.**—J. J. Culbertson, of Shreveport, La., and associates will expend \$150,000 on the erection of a 150-ton cotton-seed-oil mill.

**Jackson—Electric Light Plant.**—G. S. T. Carnes, of Memphis, Tenn., and H. H. Corson, of Schenectady, N. Y., have franchise for erection of electric-light plant.

**Vicksburg—Cotton Brokerage, etc.**—The W. L. Wells Co., capital stock \$50,000, has been incorporated for conducting a cotton brokerage business, etc.

## MISSOURI.

**Carrollton—Mercantile.**—Incorporated: The Harshbarger & Colbert Grocery Co., capital stock \$10,000, by W. L. Harshbarger, A. N. Colbert, Charles H. Gesling and Charles S. Sinnard.

**Central City—Lead Mining, etc.**—The Willow Mining Co.'s lead and zinc mines and concentrating mill has been sold to Archibald McCullough, Jr., and A. Brownlee, of New York.

**Corder—Coal Company.**—Incorporated: The Diamond Coal Co., capital stock \$4000, by R. A. Reynolds, W. M. Graves, C. L. Wilson and others.

**Kansas City—Chemical Company.**—Incorporated: The W. H. Moore Chemical Co., capital stock \$10,000, by G. H. Moore, Elizabeth E. Moore and W. N. C. Sheetz.

**St. Joseph—Manufacturing.**—Incorporated: The R. T. Davis Mill & Manufacturing Co., capital stock \$200,000, by R. M. Davis and Mary J. Davis.

**St. Louis—Distillery.**—The St. Louis Distillery Co., capital stock \$60,000, has been incorporated by Francis Kuhn and others.

**St. Louis—Shoe Company.**—Incorporated:

The Studebaker Shoe Co., capital stock \$6000, by J. P. Shertzer and J. S. Wolff, W. R. Studebaker and E. H. Studebaker.

**St. Louis—Tool Company.**—Incorporated: The Hynson Tool & Supply Co., capital stock \$2500, by L. D. Hynson, W. N. Davis and M. P. Hynson.

**St. Louis—Paving Company.**—Incorporated: The St. Louis Mastic & Paving Co., capital stock \$150,000, by J. W. Carkins, Y. S. Hoss, W. J. Ford, W. A. Cann and W. A. Bennett.

**St. Louis—Liquor Company.**—Incorporated: The F. O. Lange Wine & Liquor Co., capital stock \$30,000, by F. O. Lange, C. H. Muetze and C. H. Bolgord.

**St. Louis—Pharmacy.**—Incorporated: The Waterhouse Pharmacy Co., capital stock \$10,000, by Dr. A. Hesse, Hattie and John R. McAlpine.

## NORTH CAROLINA.

**Almyra—Telephone Line.**—The Almyra Telephone Co. was incorporated, with capital stock of \$5000, by Will A. Wynne and W. W. Wynne, of Raleigh, N. C., and N. E. Edgerton, of Selma, N. C. Address the last named.

**Apex—Cannery.**—The Apex Canning Co. has been incorporated, with capital stock of \$4000, by Joseph J. Rogers and others; plant already established.

**Balfour—Knitting Mill and Pants Factory.**—The Balfour Manufacturing Co. contemplates the establishment of a knitting mill and a pants and shirt factory. Address Wm. B. Troy.\*

**Charlotte—Furniture Factory.**—Frank, Paul and Arno Krutz will establish a furniture factory.

**Concord—Cotton Mill.**—A \$50,000 stock company has been organized to erect a cotton mill; J. C. Lippard can give information.

**Mount Olive—Electric Light Plant.**—J. D. Williams, of Kenansville, N. C., will establish an electric-light plant in Mount Olive.

**Norwood—Cotton Mill.**—A stock company is being organized to erect a 5000-spindle cotton mill; A. M. Asbury and L. H. Lentz, both of Mount Holly, N. C., are interested.

**Red Springs—Telephone Lines.**—The Red Springs Land & Improvement Co. has permission for the construction of a telephone system.

**Washington—Ice Factory.**—B. L. Susman contemplates the installation of an ice factory.\*

## SOUTH CAROLINA.

**Bamberg—Cotton Mill.**—The Bamberg Cotton Mills will issue \$40,000 in bonds, and it is said that the funds so acquired will be expended in new machinery.

**Charleston—Rice Cultivation, etc.**—Incorporated: The Combahee Land & Rice Co., to plant rice and engage in a general factory business; E. C. Hesse, president; W. H. Shingler, secretary and treasurer.

**Fort Mill—Cotton Mill.**—The Fort Mill Manufacturing Co. talks of putting in finishing machinery.

**Greer Depot—Cotton Mill.**—The Brooks Manufacturing Co., reported last week as incorporated, is to operate the cotton-baling factory of E. S. Brooks, putting in new machinery and erecting a warehouse.

## TENNESSEE.

**Brownsville—Machine Shops.**—Alex. Claborn will establish machine works.

**Centerville—Bridges.**—The county court will expend \$5000 for construction of new rock piers, bridges, etc. Address J. C. Peeler.\*

**Chattanooga—Cotton Mill.**—E. G. Richmond, Mr. Campbell and others will organize a \$100,000 stock company to build a 10,000-spindle cotton mill.

**Chattanooga—Underwear Factory.**—A \$10,000 stock company will be organized to establish an underwear factory; names of projectors will be announced later.

**Chattanooga—Cotton Mill.**—Application has been made for charter for the Vance & Kirby Manufacturing Co., and purpose the manufacture of cotton goods; a mill will be erected at once to accommodate 10,000 spindles, of which 6000 will be installed at once, and 150 hands will be employed; incorporators are J. C. Vance, H. W. McElwee, L. A. Peace, H. K. Vance, R. N. Phillips and R. D. Twinam. Address J. C. Vance.

**Gallatin—Water Works.**—A committee has been appointed to investigate regarding the

proposed water works, obtaining estimates, etc.; E. O. Buchanan can give information.

Hartsville—Tobacco Manufacturing.—A tobacco manufacturing company has been organized by M. L. Wright, A. L. Dalton, J. L. Harris, J. M. Carr and Burnley & Hall, with a capital stock of \$6000.

Memphis—Steamboat Line.—Charter granted to the Memphis & Vicksburg Packet Co., with a capital stock of \$30,000; incorporators, A. L. Cummins, Lee P. Cummins, Anna E. Cummins, J. F. Cummins and A. E. Cummins.

Memphis—Oil Mill.—Charter granted to the Richmond Cotton Oil Co., with a capital stock of \$150,000. The incorporators are E. G. Richmond, W. D. Roberts, H. Bond, J. E. Wilburn and H. H. Bond, all of Chattanooga. Company will erect the cottonseed-oil mill noted last week as decided upon. Address E. G. Richmond, Chattanooga.

Nashville—Powder Mills.—The Sycamore Powder Mills, recently burned, will be rebuilt immediately, and order for machinery has been placed.

#### TEXAS.

Dallas—Art Company.—Incorporated: The Hanchett Art Co., capital stock \$8000, to manufacture and sell pictures, picture frames, artists' materials, works of art, etc.; incorporators, J. A. White, M. M. and A. E. Hanchett. Address A. E. Hanchett.

Dublin—Ice Factory, etc.—The Dublin Ice & Storage Co. has been incorporated, capital stock \$20,000, for the manufacture and sale of ice and soda water; incorporators, W. F. Miller, J. N. Graves and M. C. Gillett. Address W. F. Miller.

Fort Worth—Clothing Company.—Incorporated: The Butts Suit & Cloak Co., capital stock \$10,000, by C. A. Butts, W. V. Smith and R. F. Butts.

Houston—Cold storage Plant.—The Armour Packing Co., of Chicago, will build a cold-storage plant in Houston; building to be 60x120 feet, equipped fully for smoking, curing and storing meats, etc., and will cost \$12,000.

Port Arthur—Grain Elevator.—The Kansas City, Pittsburg & Gulf Railroad has awarded contract to the Barnett & Record Co., of Minneapolis, Minn., for the construction of its proposed 200,000 bushel grain elevator.

Waco—Gas Machines.—Incorporated: The Daylight Gas Machine Co., capital stock \$3000, to manufacture and sell acetylene gas machines and everything incident thereto; incorporators, N. S. Hill, R. H. Hill and Ed Phillips. Address N. S. Hill.

Waco—Machine Company.—Incorporated: The White Mattress Machine Co., capital stock \$10,000, for operating, leasing or selling White's patent mattress machines; incorporators, Edgar C. Talley, George M. Scarborough and H. W. Brown.

Waxahachie—Cotton Compress.—Chartered: The Waxahachie Compress Co., capital stock \$20,000, by C. W. Gibson, R. Vickery and R. L. Goodloe, for the operation of compresses.

#### VIRGINIA.

Alexandria—Steamboat Lines.—Incorporated: The Mount Vernon & Marshall Hall Steamboat Co., to do a steamboat and excursion business, capital \$100,000. The company is authorized to own 1000 acres of land with riparian rights, and to build wharves and docks; Frederick Mertens, president; Theodore L. Holbrook, vice president; H. F. Woodard, secretary; W. M. Mertins, treasurer, who, with Cuthbert W. Ridley, are the directors, all of Washington, D. C., except Mr. W. M. Mertins, who is of Cumberland, Md. Address the president.

Buena Vista—Hardwood Factory.—Henry Dunkort, of Cincinnati, O., has leased a building, with power, in Buena Vista, and will put in machinery for the manufacture of parquet strips from hardwood.

Carter's Mills—Box Factory.—H. N. Vandergift is erecting a tobacco-box factory.

Lynchburg—Gold Mining.—Gold deposits have been found on the farms of Joseph Parker and L. Clark Leftwich, in Amherst county, near Lynchburg, and it is possible that Washington (D. C.) and Philadelphia (Pa.) capitalists will be interested, so that developments may follow.

Norfolk—Manganese Mines, etc.—Incorporated: The American Manganese Co., for the mining and manufacturing of the ores of manganese and other metals. The capital stock shall not be less than \$100,000 nor more than \$300,000; Charles Q. Freeman, president; Fred W. Varker, vice president; Benj. L. Greider, secretary and treasurer; these, with Alfred A. McCreary and Theo. H. Enis, form the board of directors, all of New York State.

Patrick County—Timber Lands.—Kibber

& Kay, of Ohio and West Virginia, have purchased the timber on 45,000 acres of land in Patrick county and will cut same, building a railroad to facilitate operations; firm may be addressed care of N. M. Pedigo, The Hollow, Va.

Richmond—Shirt Factory.—The establishment of a shirt factory is proposed; A. L. Adamson is interested.

The Hollow—Saw Mill.—J. R. Pedigo will establish a portable saw-mill addition to his plant.

Toano—Bottling Works.—Chartered: The Taskinas Spring Co., to manufacture, bottle and sell mineral waters and other non-alcoholic drinks, as noted last week. Wilbur H. Davis, of Boston, is president and treasurer; D. J. Lear, Richmond, secretary; other charter members are W. H. Keene, of Boston; M. M. Martin and Geo. Ainslie, of Richmond. Address Taskinas Spring Co., care of Geo. Ainslie, Richmond.

Waynesboro—Plumbago Deposits.—A deposit of plumbago has been found on the property of Crowder & Anderson.

Waynesboro—Lumber Mills, etc.—Crowder & Anderson have purchased a large tract of timber land in Albemarle county, and will develop same, erecting thereon a saw, lath and heading mill.\*

Woodstock—Cannery.—A. N. Boyer and A. M. Boyer will erect a steam cannery of 12,000 cases capacity daily.

#### WEST VIRGINIA.

Barnum—Coal Mines.—The Watson Loy Coal Co. has commenced the development of its coal lands, which are estimated to contain 2,000,000 tons; extensive mining and railroading equipments are being installed and over fifty men are employed.

Charleston—Flour Mill.—Incorporated: The Sillman Milling Co., with an authorized capital of \$50,000, by Peter Sillman, James H. Nash, C. A. Gates, R. G. Hubbard and Val Fourth; company will continue the operation of Peter Sillman's mill.

Clay County—Coal Lands, etc.—J. M. Cameron, Andrew Brockenhoff, John Boyd and William Thompson, Jr., of Pennsylvania, are preparing to arrange for the development of 10,000 acres of coal lands in Clay county.

Lazearville—Cannery.—Application has been made for a charter for the Lazear Cannery Co., for the purpose of establishing a cannery. The incorporators are H. G. Lazear (who can be addressed for information), Albert Murphy, Albert Caldwell, James Caldwell and Mrs. H. G. Lazear.

Martinsburg—Electric Company.—The Standard Electric Magnetic Power Co. was chartered to operate a plant, capital limited to \$5,000,000. The incorporators are R. Miles Robinson and W. L. Teter, of Philadelphia, Pa.; F. S. Seaman and M. L. Ritter, of Reading, Pa., and F. C. Stalnaker, of Hanover, Pa.

#### BURNED.

Big Sandy, Texas.—The Commercial Hotel, Charleston, S. C.—Wellings Lumber Mill; loss \$3000.

Double Pipe Creek, Md.—Elevator and warehouse of Calvin B. Anders.

Helm, Texas.—Cotton gin of Dr. B. T. Shackelford; loss \$3000.

Louisville, Ky.—The O. K. Stove & Range Co.'s factory; loss \$50,000.

Peacher Mills, Tenn.—The Peacher Mill Co.'s woolen mill and pants factory; loss \$15,000.

Tillery, N. C.—The North Carolina Lumber Co.'s mills.

#### BUILDING NOTES.

Alexandria, La.—Hotel.—E. E. McKibbin, of Shreveport, La., has completed plans and specifications for the Alexandria Hotel Co.'s proposed building; to be three stories high, have seventy-five rooms, front of buff-brass brick with stone trimmings, electric lights and bells, furnace heat, etc., and cost complete \$25,000.

Algon, Texas.—Mrs. P. J. Willis will build a storehouse.

Baltimore, Md.—Hall Building.—The Germania Maennerchor will expend \$8000 on improvements to its hall building; address care of Otto L. Schilling.

Baltimore, Md.—Dwellings.—Charles J. Miester has permit to build eight three-story residences.

Baltimore, Md.—Dwellings.—M. H. Murray will erect three three-story brick dwellings; J. Appleton Wilson has completed plans for cottage to be built at Catonsville by John Nagle for Thomas Yearly; J. Apple-

ton Wilson has completed plans for church for Bohemian Presbyterian congregation.

Baltimore, Md.—A. H. Bleier has completed plans for a four-story apartment-house for Mrs. F. B. Hamilton, to have bathrooms on each floor, etc. J. E. Lafferty has completed plans of the improvements for the Franklin Street M. E. Church, to cost \$15,000.

Beaumont, Texas—Temple.—D. P. Kaufman has completed plans for a \$10,000 Masonic temple to be built in Beaumont.

Bridgeport, Texas.—Church.—Contract awarded to J. W. Crenshaw for the erection of a \$2000 church building.

Camden, Tenn.—Church.—The Baptist congregation will build a church.

Charlotte, N. C.—Business Block.—W. T. Wilkinson will let contract this week for the erection of a three-story business block after plans by C. C. Hook.

Charlotte, N. C.—Church.—The Trinity M. E. Church has adopted the plans of Hayden & Wheeler, of Atlanta, for the proposed \$15,000 building; contract to be let about May 1.

Chattanooga, Tenn.—College.—Grant University will erect a \$15,000 college building for medical students. Address Dr. Race, chancellor of university.

Columbia, S. C.—Temple.—Wilson & Edwards are preparing plans for Masonic temple, 30x100, three stories, terra cotta and stone, etc.

Columbus, Ga.—Opera-house.—Messrs. Springer, theatrical managers, will build an opera-house, for which plans are now being prepared.

Dillon, S. C.—Courthouse, etc.—A. J. Bryan & Co., of Atlanta, Ga., have submitted plans and specifications for the proposed courthouse and jail. Address county clerk.

Hagerstown, Md.—Temple.—Thos. Carles has contract for the erection of Masonic Temple at \$15,000.

Kansas City, Mo.—Auditorium.—The proposed auditorium is to cost \$100,000, and be constructed of terra-cotta, composition or metal roofing, fire-proofing materials, steam heat, electric lighting, gas and electric fixtures, plumbing, steel structural work, etc. Bids will be received by about May 1. Address Frederick E. Hill, architect, New York Life Building.

La Grange, Ga.—Church.—Pike Bros. have contract at \$10,000 to erect church building.

Lawndale, N. C.—Store.—The Cleveland Cotton Mills will build a large department store after plans by C. C. Hook, of Charlotte, N. C.

Louisville, Ky.—Stores.—Clark & Loomis are preparing plans for six storehouses for the Hogan Mantle Co.

Louisville, Ky.—Convent, etc.—The Ursuline Sisters are having plans prepared for a convent and chapel to cost \$25,000.

Louisville, Ky.—Residences.—Chas. D. Meyer is preparing plans for two residences for John Gottbrath to cost \$5000 each.

Louisville, Ky.—Church Addition.—Baptist church has permit to erect a \$2500 addition. Address Rev. S. H. Williams.

Mayfield, Ky.—Stores, etc.—C. Farthing has contracted for the erection of four two-story brick stores; Hale, Merritt & Sheldon will erect a brick block.

New Orleans, La.—Theaters.—Contract for the erection of two theaters for Klaw & Erlanger has been awarded to E. B. Fulton, not including heating, lighting and interior decorations.

Newport News, Va.—School.—Plans have been accepted for the proposed new school building as prepared by P. Thornton Marrye; structure to be 80x80 feet, three stories high, heating system to be indirect hot blast from furnace or steam, have electric fans, etc.

Parsons, W. Va.—Courthouse.—A circular addressed to contractors is now being issued regarding the proposed courthouse to be erected by Parsons county. Bids are to be opened May 20. Address for circulars the County Court clerk.

Roanoke, Va.—School.—Contract has been awarded to Markey & Co. for the erection of a city schoolhouse.

Rock Hill, S. C.—Residence.—O. S. Poe will build a nine-room residence after plans by C. C. Hook, of Charlotte, N. C.

Sturgis, Ky.—Auditorium.—H. L. Mosgrove will build an auditorium.

Thomas, W. Va.—Cottages.—Eugene Wilson, of Deer Park, Md., has contract to erect twenty double cottages at Thomas.

Washington, D. C.—Dwellings.—John S. Larcombe has contract to erect a dwelling for J. Maury Dove; Julius Wenig has pre-

pared plans for a three-story 25x50-foot dwelling for Frank Ruppert, to have steam heat, elevator, tiled bathroom and vestibule, etc.; Benjamin W. Guy will erect two brick dwellings; Elizabeth Scherger will erect a brick dwelling, three stories high, without water or steam heat installed, etc.; W. A. Kimmel will erect three houses, steam heat.

Yazoo City, Miss.—Theater.—John Lear, A. F. Barbour and W. J. Jones will build the \$30,000 opera-house previously noted.

#### RAILROAD CONSTRUCTION.

##### Railways.

Amarillo, Texas.—It is reported that the Pecos Valley Railroad Co. has finally arranged to build the line from Roswell, N. M., to Amarillo, where it will connect with the Fort Worth & Denver City Railroad. The construction work is to begin at Roswell and Amarillo at the same time. E. O. Faulkner, at Eddy, N. M., is receiver of the road. The new line is to be 100 miles long, and is called the Pecos & Northern Texas.

Atlanta, Ga.—The Atlanta & Douglasville Railroad Co. has asked for a franchise to build its proposed electric line between the points mentioned. Joseph James is secretary of the company.

Baltimore, Md.—Residents of the towns of Cockeysville and Timonium are negotiating with the Consolidated Railroad Co. to extend its trolley line to those places from the present terminus, Towson. W. A. House is general manager of the company at Baltimore.

Decatur, Ala.—A correspondent of the Manufacturers' Record states that among the promoters of the railroad between Decatur and Danville are Joseph Shackelford and T. L. Baker, of Danville; also Arthur Lewis and H. B. Scott, of Decatur. The line may possibly be constructed to Jasper, Ala., and Aberdeen, Miss., where it would connect with the Illinois Central system.

Fitzgerald, Ga.—A correspondent of the Manufacturers' Record writes that the proposed Fitzgerald & Atlantic Railroad will be about twenty-seven miles long. Frederick J. Clark is one of the promoters at Fitzgerald.

Galveston, Texas.—It is stated that the Missouri, Kansas & Texas Company has decided to build about seven miles additional track at Galveston to increase its storage facilities at that point. A. A. Allen, at Dallas, Texas, is vice-president of the company.

Greensboro, N. C.—It is rumored that the Southern Railroad Co. may build a line between Greensboro and Goldsboro, a distance of 130 miles, in case it is unable to arrange to operate the North Carolina Railway. Frank S. Gannon, at Washington, D. C., is vice-president of the company.

Indianola, Miss.—The Memphis & Sunflower River Railroad Co. has been organized to build a line from Indianola to Dockery, in Sunflower county, also to Boyle, in Bolivar county, terminating at the Mississippi river. A. T. Averill, George T. Hodges and C. M. Averill, all of Cedar Rapids, Ia., are interested. They will utilize the Boyle & Sunflower River Railroad, twenty-five miles long, and now in operation, for a portion of the new line.

Knoxville, Tenn.—Thos. B. Harned, legal representative of the Knoxville & Bristol Railroad Co., advises the Manufacturers' Record that this company will probably build extensions from Knoxville to Blaine Station, a distance of eighteen miles, and from Bristol to Bean's Station, a distance of seventy-five miles. This will give a connection with the Norfolk & Western at Bristol and complete a new line between Bristol and Knoxville. Adolph Segal, of Philadelphia, is one of the company. Mr. Harned's address is 400 Chestnut street, Philadelphia.

Macon, Ga.—Messrs. G. B. Elder, of Flovilla, Ga., and J. R. Smith, of Macon, Ga., are interested in the Indian Springs & Flovilla Railroad, which they and others recently purchased at foreclosure sale. It is understood that a new company will be formed and a portion of the road will be extended. It is a line in the suburbs of Macon, three miles in length and operated by steam-power.

Memphis, Tenn.—J. T. Harahan, vice-president of the Illinois Central, in a letter to the Manufacturers' Record confirms the report that \$1,200,000 will be used in improving the road between Fulton, Ky., and Memphis, Tenn., and that contracts have been let for most of this work.

Mobile, Ala.—The Mobile & Ohio Railroad Co. has completed its branch line into the trucking district around Mobile a distance of eight miles, and the road is now in operation.



Moorhead, Miss.—C. H. Pond, vice-president of the Yazoo Delta Railway, informs the Manufacturers' Record that work is now in progress on the extensions of its line from Ruleville to Tutwiler, Miss., twenty-two miles, and from Moorhead south into Washington county, sixteen miles. At Tutwiler it will connect with the Yazoo & Mississippi Valley division of the Illinois Central.

Napoleonville, La.—The Southern Pacific Railroad Co. has determined to build about eight and one-half miles to Napoleonville from Thibodaux Station. Contracts, it is reported, have been let for the work. J. T. Mahl, at Houston, Texas, is engineer in charge.

Natchez, La.—Thomas H. Lewis, of Opelousas; P. J. Chapples, of Crowley, and Alexander Sylvester, of Alexandria, are a committee which has recently been in Natchez, Opelousas & Gulf Railroad. This line is to extend through Louisiana from Natchez to a point on the Gulf of Mexico by way of Opelousas.

New Orleans, La.—It is reported that the government may build a tramroad about six miles long to connect with the New Orleans, Fort Jackson & Grand Isle Railroad. J. S. Landry, superintendent of the railroad company, may give information.

Newport News, Va.—The Newport News & Old Point Electric Co., in which S. Gordon Cumming, of Hampton, is interested, has secured a franchise to use certain streets in Hampton. It proposes to build a trolley line between Newport News and Old Point Comfort.

Richmond, Va.—The Richmond & Petersburg Electric Railroad Co., which is promoting a line between the towns mentioned, has elected Corbin Warwick, of Richmond, president, and John S. Priuore, of New York, vice-president. Others interested are Messrs. James Parker, Z. G. B. Woolworth, Ferdinand Beach, George L. Catlin, W. Howard Gilder, C. M. Mahoney, T. M. Dietrick, Morriewether Jones and Otway Warwick. The line will be about thirty miles in length.

Sumter, S. C.—It is reported that New York capitalists have become interested in the railroad from Sumter to a connection with the South Carolina & Georgia system. It is being promoted by the Sumter & Wateree Railroad Co., in which H. J. McLaurin, of Sumter, is interested. The road will be about sixteen miles long.

Sweetwater, Texas.—The Rock Island, Sweetwater & Southwestern Railroad Co. has been organized to build a line from Graham to Spofford Junction, on the Chicago, Rock Island & Texas system by the way of Anson and Sweetwater.

Sweetwater, Texas.—Robert S. Doubleday, contractor for the extension of the Colorado Valley Railroad, advises the Manufacturers' Record that it includes the construction of about fifty miles of line. Rails are being contracted for. Mr. Doubleday's address is San Antonio, Texas.

Valdosta, Ga.—Messrs. Thomas Crawford & Co. advise the Manufacturers' Record that the railroad being promoted between Valdosta and Albany will be seventy miles long, and that work will begin upon it as soon as the present national difficulties are settled.

Velasco, Texas.—It is stated that the Velasco Terminal Co. will build its proposed extension in the suburbs of Velasco during the present year. The length of the branch is to be three and one-half miles. L. L. Foster is manager at Velasco.

Wheeling, W. Va.—President Alexander P. Funk, of the Pittsburgh, Connellsville & Wheeling Railroad Co., informs the Manufacturers' Record that this company intends to build from Unlontown, Pa., to Wheeling, a distance of eighty miles, by way of Moundsville, over the proposed line of the Moundsville, West Virginia & Wheeling, as soon as possible. Mr. Funk's address is No. 11 Broadway, New York. P. M. Smith, president of the Standard Structural Co., at the same place, is president of the Moundsville, West Virginia & Wheeling Railroad Co.

Winfield, Ala.—It is reported that construction work is about to begin on the proposed railroad to coal fields in Fayette county, which will connect with the Kansas City, Memphis & Birmingham road at Winfield. Henry Wellman, of New Orleans, is one of its promoters. He is president of the Mississippi Valley Coal & Railroad Co.

#### Street Railways.

Baltimore, Md.—Work has begun upon the extension of the City Passenger Railway trolley system in the eastern suburbs. Walter S. Franklin is president of the company.

Jackson, Miss.—Another franchise has been granted for an electric railroad to S. T.

Carnes, of Memphis, Tenn., and H. H. Corson, who, it is stated, represents the General Electric Co., of Schenectady, N. Y. The railroad will be five miles long and operated by the trolley system. [The franchise granted several weeks ago to parties in Cleveland, O., has been forfeited.—Ed.]

Little Rock, Ark.—It is announced that M. D. L. Cook has secured a contract for building the power line promoted by the Army Post Electric Railroad Co., referred to in this column; is to be completed by July 1.

Little Rock, Ark.—The Army Post Electric Railroad Co. has been organized, with \$85,000 capital, to build a road in the suburbs about three and one-half miles long. R. F. Sojourner, of Little Rock, is secretary, and D. Gilson, of St. Louis, president.

Parkersburg, W. Va.—A. Hallock, contractor for the trolley street railway, has begun work, and it is expected to complete the line by July 1 or sooner.

Pensacola, Fla.—The Pensacola Railroad Co., it is stated, has determined to use electric motors on the balance of the railroad line in which it is interested, in the suburbs of Pensacola, and may build an extension of about five miles to a point on the harbor. W. H. Northrup, of Pensacola, is president of the company, and William H. Bosley, of Baltimore, is one of the directors.

St. Louis, Mo.—It is reported that the South Broadway Improvement Association contemplates building a line in the vicinity of this thoroughfare. Among those interested are John Becker, Jr., and N. H. Gidenson.

Vicksburg, Miss.—The electric railroad in which Percival Steele, of Chicago, is interested has secured a franchise to build its line in the city and suburbs.

#### Machinery, Proposals and Supplies Wanted.

**Manufacturers and others in need of machinery of any kind are requested to consult our advertising columns, and if they cannot find just what they wish, if they will send us particulars as to the kind of machinery needed we will make their wants known free of cost, and in this way secure the attention of machinery manufacturers throughout the country. The MANUFACTURERS' RECORD has received during the week the following particulars as to machinery that is wanted.**

Beltting.—See "Cotton Gin."

Boiler and Engine.—See "Electric-light Plant."

Boiler and Engine.—William Aey, Jr., Amite City, La., wants estimates on 15 or 20-horse-power boiler and engine, delivered at Sidon, La.

Boiler and Engine.—Eagle Foundry Co., W. J. Teague, secretary, Greensboro, N. C., is in the market for 25 or 30-horse-power engine and boiler.

Bone Mill.—George H. Bellinger, 16 South College street, Charlotte, N. C., wants to buy a bone-meal mill.

Brick and Tiling.—A. J. Slaton, Leitchfield, Ky., wants prices on tiling, brick, iron and roofing.

Brick Works.—Moore County Brick Co., Southern Pines, N. C., is about to buy drying shed for brick works.

Bridges.—County court, Centerville, Tenn., will ask bids for the construction of three rock piers, bridges, etc. Address J. C. Peeler.

Building Materials.—Eagle Foundry Co., W. J. Teague, secretary, Greensboro, N. C., wants prices on lime in carload lots.

Cereal Machinery.—Lawler & Wortham, Huntsville, Ala., want estimates on 50-barrel flour mill (roller), new or second-hand; machinery for rolled oats, oatmeal, corn starch, grits and hominy; water-wheel to be used.

Clothing Machinery.—See "Sewing Machines."

Coffee Roasters.—W. W. Harwell, 800 Selma street, Mobile, Ala., wants to buy coffee-roasting machines.

Corn Mill.—See "Cotton Gin."

Cotton Compress.—See "Cotton Gin."

Cotton Gin, Press, etc.—William Aey, Jr., Amite City, La., wants estimates on 80-saw cotton gin, feeder, condenser, cotton press, wagon scales, belt elevator, corn mill, shafting, beltting, pulleys, etc., all to be delivered at Sidon, La.

Designs, etc.—H. H. Martin, Abbeville, Ala., wants designs for cottages.

Drying Equipment.—See "Brick Works."

Drying Plant.—See "Phosphate Machinery."

Electrical Specialties.—A. A. Haynes, Tabor, N. C., wants addresses of manufacturers of lightning rods.

Electric-light Plant.—H. E. Graper, Lexington, Tenn., wants to buy an electric-light plant for town of 2000 people.

Electric-light Plant.—Clinton Water & Light Co., Clinton, Ky., will soon ask bids on the construction of electric-light plant and water works.

Electric-light Plant.—C. W. Turner, Maiver, Ark., will need 100-horse-power boiler, 75-horse-power engine, 600-light dynamo (alternator), are lamps, etc., for complete plant.

Excelsior Machinery.—Catawba Furniture Co., Marion, N. C., wants machinery for wood excelsior.

Flour Mill.—See "Cereal Machinery."

Fuel.—Sealed proposals in duplicate will be received until May 5 to supply about 5200 tons of hard, white ash, furnace coal, ten tons hard, white ash, stove coal, 100 cords of hickory wood and fifty cords spruce-pine wood. Specifications may be had upon application. Address G. W. Baird, chief engineer, U. S. N., superintendent War and Navy Department Building, Washington, D. C.

Grinding Mill.—See "Bone Mill."

Grist Mill.—See "Cereal Machinery."

Heating Apparatus.—A furnace for church building will be wanted at Wolfe City, Texas. Address C. L. Parrott.

Ice Factory.—B. L. Susman, Washington, D. C., wants to obtain estimates on ice-factory equipment.

Iron.—Lack Singletree Co., Paducah, Ky., wants prices on several carloads of bar iron.

Iron-working Machinery.—See "Machine Tools."

Knitting Machinery.—William B. Troy, Balfour Manufacturing Co., Balfour, N. C., wants estimates on knitting machinery.

Label Machinery.—Deanes & Miner, Ronda, N. C., want quotations on wood-label machinery for manufacturing wood labels for nurserymen, etc.

Machine Tools.—Auburn Wagon Co., Martinsburg, W. Va., is in the market for a second-hand trip hammer, between forty and sixty pounds capacity.

Machine Tools.—Folding Coop Co., S. F. King, secretary, Charlotte, N. C., will need machinery for cutting iron, punching holes, bending iron and wire, woodworking machinery, etc.

Machine Tools.—Lack Singletree Co., 1200 South Third street, Paducah, Ky., wants estimates on power hammers, shears, blowers, forges, etc., for complete singletree factory.

Oil Machinery.—J. R. Hanohan, Charleston, S. C., wants catalogues of oil presses, especially of those for pressing oil from fish.

Paper-box Machinery.—T. J. Wilson, Winston, N. C., wants addresses of makers of machinery for manufacturing paper boxes, bugs, etc.

Phosphate Machinery.—Hanover Land & Improvement Co., J. H. Chadbourne, Jr., Wilmington, N. C., is in need of a dryer for phosphate rock.

Piping.—W. H. Gibbs & Co., Columbia, S. C., want addresses of makers of wrought-iron piping.

Pulleys, etc.—See "Cotton Gin."

Railway Equipment.—Shay, care of Manufacturers' Record, wants to buy a second-hand Shay locomotive for logging railway, 30-inch gauge or wider. Give full particulars in first letter.

Railway Equipment.—Moore County Brick Co., Southern Pines, N. C., is about to buy tracks, cars, etc., for brick works.

Roofing.—William Aey, Jr., Amite City, La., wants estimates on iron roofing.

Roofing.—Osborne & Clinkscales, Anderson, S. C., want to correspond with manufacturers of slate roofing.

Roofing.—Eagle Foundry Co., W. J. Teague, secretary, Greensboro, N. C., wants prices on paper and metal roofing.

Roofing, etc.—A. J. Slaton, Leitchfield, Ky., wants prices on tiling, brick, iron and roofing.

Saw Mill.—Crowder & Anderson, Waynesboro, Va., are in the market for saw mill.

Scales.—See "Cotton Gin."

Sewing Machines.—William B. Troy, Balfour Manufacturing Co., Balfour, N. C.,

wants estimates on machinery for manufacturing pants and shirts.

Singletree Factory.—See "Machine Tools."

Street Improvements.—Sealed bids will be received until May 5, both separately and combined, for street grading, curbing and paving. Plans and specifications, terms of contract, etc., now open for inspection at the office of mayor. Address D. C. Harkins, recorder, Cameron, W. Va.

Telephone Equipment.—Almyra Telephone Co., Selma, N. C., is in the market for Nos. 12 and 14 galvanized and copper wire; crossarms, 2 to 10-hole; booths for toll stations, extension bells, office wire and fixtures, etc.

Water-wheel.—See "Cereal Machinery."

Water Works.—Clinton Water & Light Co., Clinton, Ky., will soon ask for bids on the construction of water-works and light plants.

Water Works.—Bids will be opened April 20 for the construction of water works at Calhoun, Ga., to consist of two 40-horse-power boilers, two 500,000-gallon pumps, three and one-quarter miles of four, six and eight-inch pipe, twenty-four hydrants, a 500,000-gallon concrete reservoir, etc.; population of town is nearly 1000; Walton & Wagner, of Rome, Ga., designed the system. Address W. L. Hillhouse, mayor.

Windmill.—Augusta Factory, Augusta, Ga., wants a windmill.

Wire and Ironworking Machinery.—See "Machine Tools."

Woodworking Machinery.—See "Label Machinery."

Woodworking Machinery.—Anderson Lumber Co., Anderson, S. C., wants planing machine capable of dressing lumber up to twelve inches wide and to six inches thick, and for making all kinds of moldings; combined planers and molders wanted.

Woodworking Machinery.—Folding Coop Co., S. P. King, secretary, Charlotte, N. C., wants to buy machinery for woodworking.

Woodworking Machinery.—W. T. Roberts, Gurley, Ala., wants to buy lathes for handles, etc.; second-hand will do.

Woodworking Machinery.—Crowder & Anderson, Waynesboro, Va., are in the market for saw mill, lath mill and heading-mill machinery.

Woodworking Machinery.—Enterprise Foundry and Machine Works, Rock Hill, S. C., is in the market for a woodworking planer for light shop work and single surfacer and matcher.

Woolen Mill.—N. B. Kechejian, M. D., Kayaek street, Aintab, Turkey, wants full particulars, catalogues, illustrations, prices on woolen-mill machinery of all kinds, with a view of purchase.

#### TRADE NOTES.

Ice Machinery.—Contract for the machinery for the Norfolk (Va.) Warehouse Co.'s ice factory has been awarded to the York Manufacturing Co., of York, Pa.

Mr. Frank McM. Sawyer (formerly with Harding & Gooch, of New York) has located in Anderson, S. C., to conduct a general business as architect and superintendent.

Carver Gin Company.—The Carver Cotton Gin Co., East Bridgewater, Mass., has removed its Boston office to 116 South street, where all present and prospective customers are welcome.

Heating Plant.—Contract for the installation of the heating and ventilating plant in the courthouse now building at Baltimore has been awarded to Messrs. Crook, Horner & Co., of Baltimore, at \$70,502.

De Loach Company.—In order to have office accommodations adequate to handle its large and increasing business, the De Loach Mill Manufacturing Co., of Atlanta, Ga., has removed to offices in the Austell Building, on Forsyth street, Rooms 701 and 702.

Wire Works.—A large amount of elevator enclosure and cab work is now being done by the Ludlow-Saylor Wire Co., of St. Louis, Mo. An order for eight elevator cabs has just been received from New York, and an order was recently finished for three for Worcester, Mass.

Tramways for Russia.—The Brown Hoisting & Conveying Machine Co., of Cleveland, Ohio, shipped from its plant last week a solid train of seventeen cars of machinery to Philadelphia, at which port it was loaded on the steamer Cothel for Maripol, Russia; this represents three Brown patent bridge tramways for the handling of ore for a large steel works at Maripol, these bridges

being driven by electricity. A similar but smaller shipment was also made to Trieste, Austria.

**Electrical Activity.**—In order to meet the recent demands for its machinery, the Card Electric Co., of Mansfield, O., has found it necessary to commence night operations. Some important extensions to the company's works have been completed lately and more will be made during the summer.

**Westinghouse at Austin.**—The Westinghouse Electric & Manufacturing Co. has opened a branch office at Austin, Texas, with Mr. J. E. Johnson in charge. The large contracts which this company has been handling in Mexico and the Texas region have led to the establishment of this branch.

**Ball Engines.**—The Pennsylvania Railroad has ordered for its Altoona shops two 100-horse-power tandem compound engines, arranged for direct connection to 100-kilo-watt dynamos, to be furnished by the Ball Engine Co., of Erie, Pa.; Crowley (La.) electric-light plant is to have Ball engines, and Seranton, Miss., is installing a 75-horse-power Ball engine, to be direct-connected to general electric dynamos.

**Wall Paints.**—“Every owner of a factory or other building where human beings are employed ought to paint the walls a light color. A clean factory gives the impression that the business within is clean also.” The above are but two of many strong points made by Alden Spence's Sons & Co., Boston, Mass., in an interesting circular (to be had for the asking) calling attention to their well-known “Asbestine Cold Water Paint.”

The list of agents of the Bradford Mill Co., of Cincinnati, O., manufacturer of engine lathes, comprises Charles Churchill & Co., Limited, London and Birmingham, England; Schuchardt & Schutte, Berlin, Vienna, Brussels and Stockholm; Adphe, Janssens, Paris, France; E. A. Kinsey Co., Cincinnati; J. A. Fay & Egan Co., Chicago; J. W. Wright & Co., St. Louis; Pacific Tool & Supply Co., San Francisco, and the Philadelphia Bourse, Philadelphia.

**Davis & Egan Company Changes.**—The Davis & Egan Machine Tool Co., of Cincinnati, O., will hereafter be known as the American Tool Works Co. The change of name accompanies a reorganization of the enterprise, which includes an increase of capital stock from \$500,000 to \$1,000,000, and the changes have been prompted by the steadily increasing foreign business of the company. The product of the present plants is now sold several months ahead. Mr. Charles Davis will remain as president of the company.

**Textile-mill Architects.**—Continuing the previous announcement, Messrs. C. A. M. Pray & Co., of Providence, R. I., and Charlotte, N. C., have established their temporary office in the latter city at Room 1, Hunt Building, and when the Piedmont Fire Insurance Building is completed, at 229 South Tryon street, will remove to it. Mr. William Whitman, Jr., will have charge of the Charlotte office, and will be pleased to be interviewed, or corresponded with, by prospective builders of cotton or woolen mills or other manufacturing plants.

**Marble and Granite Monuments, etc.**—What is claimed to be the “only art studio in the South for executing statuary” is being conducted at Augusta, Ga., by Mr. C. F. Kohlbruss. This plant deals in, imports and manufactures marble and granite monuments and statuary, headstones, copings, dressed building stone, etc. Many fine pieces of work located throughout the South are the work of Mr. Kohlbruss, including the Confederate monument at Greenville, S. C.; archangel in St. Paul's Church, Augusta, and the Confederate monument for Greensboro, Ga., is now being completed at this plant.

## TRADE LITERATURE.

**Machine Works.**—The Shookoe Machine Works, of Richmond, Va., Talbott & Sons Co., proprietors, will be sold at public auction on April 28. Write to N. W. Rowe for circular.

**“About Traps.”**—A pamphlet with this title, wrapped in brown wrapping paper, is being mailed to present and prospective users of the “Heintz” steam trap. This most useful article is made by the William S. Haines Co., of 130 South Fourth street, Philadelphia, Pa.

**Northrop Looms.**—In a leaflet dated April, 1898, the Draper Co., of Hopedale, Mass.,

presents a history of its connection with the art of weaving, and states in a few well-chosen words the many superior advantages which Northrop looms are claimed to possess over others in the market.

**Refrigeration for Public Institutions.**—Catalogue No. 30 of the McCray Refrigerator & Cold Storage Co., of Kendallville, Ind., contains plans and specifications, with illustrations, of the cooling-rooms and refrigerators generally essential for hotels, large restaurants and other public institutions. Copies mailed on application.

**Screws and Taps.**—Catalogue No. 7 of the Cincinnati Screw & Tap Co., of Cincinnati, O., containing illustrated descriptions of a number of its goods, is sent on application by those interested. Besides, a line of screws, nuts and taps, straighteners, arbor presses, boring tools, key-seaters, drill grinders, shop saws, micrometers, etc., are seen.

**Second-hand Steam Launches.**—The 1898 list of second-hand steam yachts and launches of Messrs. Charles P. Willard & Co., of 13 and 15 North Canal street, Chicago, Ill., has been issued. The firm has also for sale a variety of marine machinery, some new, some refitted, including yacht boilers, engines, pumps, condensers, shafting, propeller wheels and all sorts of equipment for yachts and launches.

**High-pressure Tubular Boilers.**—Boilers of this class, as made by the Murray Iron Works Co., of Burlington, Ia., are handsomely illustrated by the photographic process in a circular now being distributed. The popularity of this type of boiler is generally acknowledged by users of power. This applies, of course, to boilers built according to the latest designs, of the best materials, and by a properly equipped shop, including in the latter hydraulic riveters.

**“Sprinkler Bulletin.”**—The March 31 issue of the “Sprinkler Bulletin” contains an illustration of the immense plant at Palmer's Falls, N. Y., which is equipped with Grinnell sprinklers, and statistics about fires in manufacturing showing the merits of the Grinnell sprinklers as preventives of serious loss by fire. If you are interested in protecting your plant from fire send to the General Fire Extinguisher Co., of Providence, R. I., for one of these “Sprinkler Bulletins.”

**Gasoline Engines.**—The marine catalogue of the Charles B. King Co., of Detroit, Mich., manufacturer of gasoline engines, is being distributed. The “King” gasoline engines are placed on the market with every confidence on the part of the builder that they will prove eminently satisfactory to any purchaser. These engines are the result of long experience, combined with high-grade workmanship and material, and are claimed to be second to none in their class now offered to users of power. Send for catalogue.

**Engines.**—Catalogue No. 28 of the Murray Iron Works Co., of Burlington, Ia., treats of the simple, compound and condensing horizontal and vertical “Sioux Corliss” engines which the company builds. This establishment has been engaged in the operation of foundries and machine shops for thirty years and feels well qualified to build machines warranted to give satisfaction to all users of powers. The company determined some time ago to add a “Corliss” engine to its line, and after a careful examination of the field, decided upon the purchase of the patents and entire rights of the Sioux City Engine and Iron Works, which being effected, new shops were built at Burlington to produce the new machinery. The Murray Iron Works Co.'s former business is, of course, conducted as heretofore, and it is thus able to install power plants of almost any size and style.

The sixth annual report of the bureau of industrial statistics of Maryland treats of Baltimore as a commercial and manufacturing center, railroads, tobacco culture, the ground-rent system, oyster culture, the coal industry and a variety of kindred topics.

**Managers of mills, factories, furnaces, mines, etc., and parties starting manufacturing enterprises and needing machinery or supplies of any kind will find it profitable to consult the advertising columns of the Manufacturers' Record. Its pages contain names of the best houses in the country among manufacturers of and dealers in machinery and mill supplies.**

## FINANCIAL NEWS.

The Manufacturers' Record invites information about Southern financial matters, items of news about new institutions, dividends declared, securities to be issued, openings for new banks, and general discussions of financial subjects bearing upon Southern matters.

### Invest in Southern Mills.

According to the United States Investor, of Boston, stocks in Southern cotton mills have been in greater demand and have commanded higher prices during the last few weeks than for years. This is due partly to the disposition of Northern mill men to invest in the stocks of mills already in successful operation, instead of building new mills in the South themselves.

### Invested in Texas.

A correspondent of the Manufacturers' Record states that Mr. W. F. Bartlett, secretary of the New England Loan & Trust Co., has recently been examining the lands in Fort Bend county, Texas, and as a result has decided to invest about \$50,000 in that county. His decision was reached after examining real estate in Iowa and other parts of the West.

### New Corporations.

A bank with \$25,000 capital may be formed at Courtland, Ala. P. M. Du Bose can probably give information.

The bank recently organized at St. Francisville, La., expects to begin business about June 1 with \$20,000 capital.

John C. Wadsworth and W. C. O'Dell have formed the Cabarrus Loan Association at Concord, N. C., with \$25,000 capital.

Among those interested in the proposed bank at Denton, Md., are Frederick R. Owens and Joseph H. Bernard. The bank is to have \$50,000 capital, and will be called the People's National Bank.

The Chattel and Loan Association has been organized at Baltimore by Charles P. Fisher, Frank S. Hambleton and others, with \$30,000 capital, for the purpose of loaning money to people in moderate circumstances at a low rate of interest.

A charter has been granted to the Norfolk & Portsmouth Guaranty Title Co. The principal office is to be in Norfolk and the capital stock is to be \$100,000. The officers are H. M. Tyler, of Richmond, president; W. W. Rapley, of Washington, D. C., vice-president; Arden Howell, of Norfolk, local secretary; John G. Slater, of Washington, D. C., secretary and treasurer.

### New Securities.

It is announced that the city of Raleigh, N. C., will vote June 14 on the proposed issue of \$50,000 in school bonds.

J. M. Weathers, of Elkton, Ky., will receive bids until June 1 for \$13,700 worth of 4 per cent. bonds issued by the school district.

The issue of \$35,000 in 4½ per cent. bonds of Americus, Ga., has been sold to the Bank of Southwest Georgia, of that city, at 101.712.

Messrs. Rudolph Kleybolt & Co., of Cincinnati, O., have purchased the issue of \$20,000 in 6 per cent. bonds of Alexandria county, Virginia, at 106.

The issue of \$33,000 in water-works bonds of Fitzgerald, Ga., has been sold to F. M. Stafford & Co., of Chattanooga, Tenn., at 105.102. The bonds bear interest at 6 per cent.

A correspondent of the Manufacturers' Record states that the report is true that the city of Sedalia, Mo., has voted to issue bonds to the amount of \$15,000, to

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bear 4 per cent. interest. A. W. McKenzie will give further information.	
The Bamberg Cotton Mills, Bamberg, S. C., it is stated, is about to issue \$40,000 6 per cent. 15-year bonds. A part will be sold in Bamberg and the balance bought by Baltimore parties.	
Dividends and Interest.	
The New Orleans Water Works Co. has declared a dividend of \$2.25 per share.	
The National Marine Bank of Baltimore has declared a semi-annual dividend of 3 per cent.	
The Bayou Sara Compress Co., of St. Francisville, La., has declared a dividend of 10 per cent.	
The St. Charles Street Railway Co., of	



## Hambleton & Co.

Bankers and Brokers,

Members New York and Baltimore Stock Exchanges.

9 South Street, BALTIMORE.

High-grade Investment Bonds, Municipal, Railway, Industrial. Letters of Credit available everywhere.

New Orleans, La., has declared a semi-annual dividend of 1½ per cent.

The Border State Perpetual Building Association of Baltimore has declared a semi-annual dividend of 2½ per cent.

### Financial Notes.

William E. Griffith, of Cumberland, Md., has been appointed national bank examiner for Maryland, to succeed Marshall Winchester, who has resigned.

The Model Building and Loan Bank of Syracuse, N. Y., with a capital stock of \$5,000,000, has established a branch for the State of North Carolina in New Bern, N. C. Mr. C. C. Roach is State manager.

The Citizens' Exchange Bank, of

J. Wm. MIDDENDORF.

Members Baltimore Stock Exchange.

Wm. B. OLIVER.

## MIDDENDORF, OLIVER & CO.

Bankers and Brokers,  
No. 213 E. German Street, [KEYSER BUILDING.] Baltimore, Md.  
Stocks and Bonds Bought and Sold on Commission. Special attention given to Municipal and other Investment Loans. Dealers in Foreign Exchange. Drafts on Europe and Letters of Credit furnished.

Petersburg, Va., has elected the following board of directors: Messrs. H. W. Roundtree, Frank A. Davenport, T. L. Alfriend, B. Rand, Wellford, John Addison, W. Otto Nolling, R. Lancaster Williams, Robert G. Rennolds, T. H. Ellett, James H. Capers, John W. Rothert, W. M. Habliston.

We wish assistance of Cotton Manufacturer to develop fine water-power located in high, healthy section near Atlanta, Ga.; 200 horse-power; surrounded by cotton-fields. Address Manufacturer, care Manufacturers' Record.

### TO CONTRACTORS.

If you have any municipal bonds or warrants, taken in payment for building waterworks, court or school houses, jails, etc., write us. Conditions being favorable, we can use them.

F. M. STAFFORD & CO.

Dealers in Southern Municipal Securities, Chattanooga, Tenn.

## JOHN L. WILLIAMS & SONS, BANKERS,

Dealers in RICHMOND, VA.

Southern Investment Securities,

MUNICIPAL BONDS A SPECIALTY.

Correspondence invited.

## MARYLAND TRUST CO.

Corner South and German Sts

BALTIMORE.

CAPITAL, - \$1,000,000.

A LEGAL DEPOSITORY FOR COURT AND TRUST FUNDS.

Acts as Financial Agent for States, Cities, Towns, Railroads and other Corporations. Transacts a general trust business. Lends money on approved security. Allows interest on special deposits. Acts as Trustee under Mortgages, Assignments and Deeds of Trust; as Agent for the Transfer or Registration of Stocks and Bonds, and for the payment of coupons, interest and dividends.

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The Only Company of its kind in Maryland or the South.

Cash Capital, - - - \$250,000  
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Inspects and Insures Boilers and Elevators.  
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YOUR BUSINESS SOLICITED.

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Surplus ..... \$200,000

Transacts a general trust business.  
Allows liberal rates of interest on deposits and trust funds.

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Acts as Trustee under mortgages for railway and other companies, and as Agent for the Registration of the stock, and for the transfer of the shares of incorporated companies.

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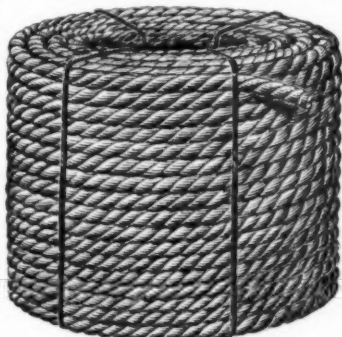
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This company is a Legal Depository for funds in the hands of Trustees or Administrators, and allows interest on same pending distribution.  
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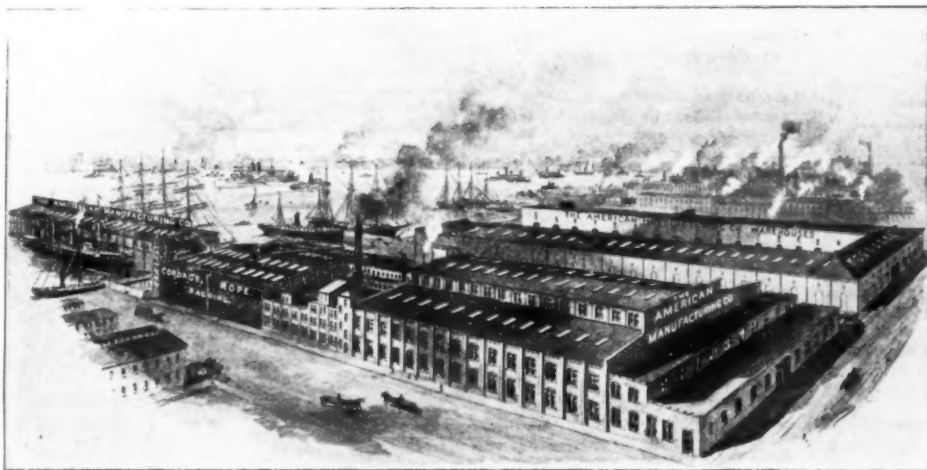
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The QUALITY of Our Rope is Our FIRST Consideration, the Cost is Secondary.

Send for Information About Transmission Rope.

Ours is the Best Made.

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						Ads. marked thus * appear every other week	
						Ads. marked thus † appear in first issue of each month	
						Ads. marked thus ‡ appear in second issue of each month	
						Ads. marked thus § appear in third issue of each month	



## PROPOSALS.

POST OFFICE DEPARTMENT.  
WASHINGTON, D. C., April 5, 1898.  
SEALED PROPOSALS will be received at this Department until Thursday, May 5th, 1898, at 2 o'clock P. M., for furnishing for the use of its Mail Equipment Shops, such supplies, consisting of wire, rivets, burrs, emery, steel, chemicals, oils, leather, thread, etc., in such quantities of the different articles respectively, and at such times and from time to time, as they may be ordered during the fiscal year, beginning July 1st, 1898.  
A complete list of the articles desired, with full specifications and form of proposal, will be furnished upon application to Second Assistant Postmaster-General.

JAMES A. GARY,  
Postmaster-General.

## PROPOSALS FOR FURNISHING REGISTERED PACKAGE, TAG, OFFICIAL AND DEAD-LETTER ENVELOPES.

POST OFFICE DEPARTMENT.  
WASHINGTON, D. C., March 26, 1898.  
SEALED PROPOSALS are invited, and will be received at this Department until 12 M. on Thursday, the 5th of May, 1898, for furnishing such Registered Package, Tag, Official, and Dead-Letter Envelopes as may be ordered for the use of the Department, postmasters, and the postal service during a period of one year, beginning on the first day of July, 1898.

Proposals must be made on the blank forms provided by the Department, securely enveloped and sealed, indorsed "Proposals for furnishing Registered Package, Tag, Official, and Dead-Letter Envelopes," and addressed to the Third Assistant Postmaster-General, Washington, D. C. Bids delivered in person must be handed in at or before the hour above specified for the receipt thereof; otherwise they will not be considered. Blank forms of proposal, with full specifications and samples of the envelopes will be furnished upon application to the Third Assistant Postmaster-General.

JAMES A. GARY,  
Postmaster-General.

## PROPOSALS FOR FURNISHING ENVELOPES FOR THE SEVERAL EXECUTIVE DEPARTMENTS DURING THE YEAR ENDING JUNE 30, 1899.

POST OFFICE DEPARTMENT.  
WASHINGTON, D. C., March 26, 1898.  
By the 96th Section of the Act of Congress approved January 12, 1895, it is made the duty of the Postmaster-General to contract for all Envelopes, both plain and printed, to be used "by his own or other Departments."

Under this authority proposals are hereby invited and will be received at this Department until 2 P. M., on Thursday, the 5th day of May, 1898, for furnishing such Envelopes as the several Executive Departments in Washington may require during the year ending June 30, 1899.

Proposals must be made on the blank forms provided by the Department, securely enveloped and sealed, indorsed "Proposals for furnishing Envelopes for the several Executive Departments," and addressed to the Third Assistant Postmaster-General, Washington, D. C. Bids to be delivered in person must be handed in at or before the hour above named; otherwise they will not be considered.

Blank forms of proposal, with full specifications, will be furnished upon application to the Third Assistant Postmaster-General.

JAMES A. GARY,  
Postmaster-General.

## PROPOSALS FOR MISCELLANEOUS SUPPLIES FOR THE POST OFFICE DEPARTMENT.

POST OFFICE DEPARTMENT.  
WASHINGTON, D. C., April 5, 1898.  
Sealed proposals will be received at this Department until Thursday, the 5th day of May, 1898, at 2 o'clock P. M., at which time and place they will be opened in the presence of bidders or their authorized agents or attorneys, for furnishing the Department with such coal, wood, ice, carpets, chairs, cotton cloth (for map mounting), soap, closet paper, dusters, corn brooms, and forage, as may be ordered during the fiscal year beginning July 1, 1898, and ending June 30, 1899.

Bids are also invited for the purchase of waste paper from the Department; old jute, old cotton canvas, old string, jute heads with rings, and scrap leather from the Mail Equipment Division, and for washing towels.

Blanks for proposals, with specifications giving detailed statements of the requirements to be met in respect to each article, and also the estimated quantities probably to be required of each, and giving full instructions as to the manner of bidding and the conditions to be observed by bidders, will be furnished on application to the Disbursing Clerk and Superintendent, Post Office Department, Washington, D. C.

The Postmaster-General reserves the right to reject any or all bids, to waive technical defects, and to accept any part of any bid and reject the other part.

JAMES A. GARY,  
Postmaster-General.

## PROPOSALS FOR SUPPLIES FOR THE POST OFFICE DEPARTMENT AND POSTAL SERVICE.

POST OFFICE DEPARTMENT.  
WASHINGTON, D. C., April 2, 1898.

Sealed proposals will be received at this Department until Thursday, May 5, 1898, at 2 o'clock P. M., for furnishing wrapping paper, wrapping paper for facing ships, twine, letter scales, post-marking and rating stamps, rubber stamps, cancelling ink, pads, paper, rubber goods, pens, pen holders, pencils, ink, mucilage, glass goods, rulers, articles of steel, rubber erasers, books, typewriter supplies and miscellaneous stationery, in such quantities of the different articles respectively, and at such times, and from time to time, as they may be ordered, during the fiscal year beginning July 1, 1898, and ending June 30, 1899, for the use of any branch of the departmental or postal service.

Blanks for proposals, with specifications giving detailed statements of the requirements to be met in respect to each article, and also the estimated quantities probably to be required of each, and giving full instructions as to the manner of bidding and the conditions to be observed by bidders, will be furnished on application to the Superintendent of the Division of Post Office Supplies, Post Office Department, Washington, D. C.

The Postmaster-General reserves the right to reject any or all bids, to waive technical defects, and to accept any part of any bid and reject the other part.

JAMES A. GARY,  
Postmaster-General.

## Bids Wanted on

## Railroad Construction.

The undersigned owners of franchise to build a railroad extending from Monroe, La. to Parish of Natchitoches, La., 89 miles, desire bids from contractors to build the above railroad. Work to commence by May 1st, 1898. Railroad line traverses undulating long leaf pine country until the fertile valley of the Red River is reached. Franchise is valuable. Address

Monroe Rwy. & Construction Co.  
MONROE, LA.

L. D. M. Lain, Prest.

## Proposals for the Installation of the Plumbing in New Courthouse, Baltimore City, Md.

Office of Courthouse Commission,  
City Hall, March 16, 1898.

Sealed proposals will be received at this office until 3 P. M. of MONDAY, April 25, 1898, and immediately thereafter opened, for the INSTALLATION OF THE PLUMBING IN THE NEW COURTHOUSE FOR BALTIMORE CITY, now in course of erection.

Copies of the drawings and specifications may be seen on and after Monday, March 25, 1898, by those desiring to submit proposals, at the office of the Inspector of Buildings, City Hall; at the office of the Architects, Wyatt & Nolting, 4 E. Lexington Street; at the rooms of the Builders' Exchange, Baltimore, or a copy of the Drawings and Specifications will be furnished on application and payment of \$25, of which \$20 will be refunded upon the return of the same complete. Each bid must be accompanied by a certified check for a sum not less than 2 per cent. of the amount of the proposal, made out to the order of the Mayor of Baltimore City.

The right is reserved to reject any or all bids, and to waive any defects or informalities in any bid should it be deemed to the interest of the city to do so. All bids received after the time stated will be returned unopened.

## BUILDING COMMITTEE OF NEW COURTHOUSE.

HENRY D. HARLAN,  
ROBT. H. SMITH,  
Sub-Committee.

## CHARLESTON, S. C.

Is showing great Commercial Development.

For Sale—Residences, Building Lots, Farms, Manufacturing and Hotel Sites.

An ideal city for a HOME. Full of historic interest. Cost of living is cheap and climate delightful. Educational facilities are unsurpassed.

Garden produce of farms near Charleston is shipped to Northern and Eastern markets at good profits.

Exchange Banking & Trust Company,  
CHARLESTON, S. C.

## The Hartzell Self-Draining Reel

is different from others, it is superior, as it is most convenient, it drains all the water out of the Hose after it has been reeled. No obstructions outside of this reel, to interfere with the free winding or unwinding of the Hose.

It is a nice ornament to any lawn. It greatly lessens the expense of keeping up a lawn, because the Hose is kept in order.

It is well mechanically made. Your customers want THEM. Will you supply them?

For descriptive circulars and price, address

The Hartzell Novelty Works, Alliance, O., U. S. A.

## THE BOOMER &amp; BOSCHERT KNUCKLE JOINT PRESS

FOR BALING Cloth, Paper, Yarn, &c.  
For any other purpose requiring great pressure.

BOOMER & BOSCHERT PRESS CO.  
200 W. WATER ST., SYRACUSE, N. Y.



## ASPHALT PAVEMENTS

Enhance the Value of Property One-Third.  
DURABLE HEALTHFUL NOISELESS  
20,000,000 square yards laid in eighteen years.

For plans and estimates apply to

THE BARBER ASPHALT PAVING COMPANY,  
General Office, 11 Broadway, New York.

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We sell 10,000 XX-6 3/4 size, good quality envelopes printed for \$10. Write for samples. ATLANTA ENVELOPE CO., Atlanta, Ga.

## \$10,000 Saved by advertising "Bids Wanted" in Manufacturers' Record.

FRANK P. MILBURN,  
Architect of

COURTHOUSE AND JAIL WORK.

The Manufacturers' Record, Baltimore, Md.

Gentlemen—\*\*\* I have advised a number of counties, towns and cities for which I have prepared plans for public buildings to advertise for bids through your paper, knowing that the results in securing competition pay well for the small cost to any county or municipality. I find that more contractors read your journal than any other paper in the Southern States. Making a specialty of public buildings for seventeen years, I can appreciate the results in securing low prices by notifying material men through such advertising as to what is wanted. I think this county secured a \$60,000 fire-proof building for \$50,000 by having large competition only.

Yours truly, FRANK P. MILBURN.

Moral—Advertise all municipal and construction work where bids are wanted in Manufacturers' Record.

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Business men desiring to open offices in Baltimore will find in the MANUFACTURERS' RECORD BUILDING superior advantages in location, comfort and convenience.

The building is modern in every respect; furnished throughout in quartered oak; steam heat, electric and gas lights, quick elevator service, mail chute, etc.

## LOCATION,

corner Lexington and North streets diagonally opposite the City Hall and Postoffice, and immediately facing the temporary Courthouse which will be occupied for the next five years. All the principal street car lines pass within one square, giving quick access to every part of the city.

Considering the location, conveniences and services, these are the cheapest offices in Baltimore.

Light, heat and janitor service free. Inspection invited.

MANUFACTURERS' RECORD PUB. CO.  
BALTIMORE, MD.

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WAS ESTABLISHED IN 1849.

Is the oldest and financially the strongest organization of its kind, working in one interest and under one management, with more capital invested in the business, and expends more money every year for the collection and dissemination of its information than any similar institution in the world. Its reports are considered in the light of a guide by both investors and those contemplating the granting of credit. In addition to a large corps of skilled employees, more than one hundred thousand correspondents contribute the result of their investigation and opinions. Subscriptions are annual, and may commence at any time the subscriber elects. Details as to prices and terms will be furnished upon application.

CHARLES F. CLARK, President,  
Baltimore Office, Equitable Building.  
H. KIRKMAN, Supt.

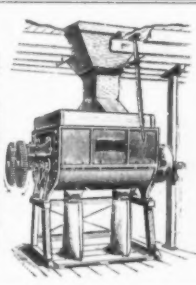
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FOR  
Hard Plaster, Cement, Paint, &c.  
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UNION MINING CO.  
MFGS. OF  
'Mt. Savage' Fire Brick

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Matthew Addy & Co.  
PIG IRON.

AGENT  
Dayton Coal & Iron Co.  
LTD.  
PIG IRON.

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Developed and Being Developed.  
125 Feet Fall at Columbus, Ga., in Chattahoochee River.

### Largest and Cheapest H. P. in the South.

Established Manufacturing Center.  
Large Operative Population. Temperate Climate.  
Columbus Was Incorporated in 1829 and Has Never Had An Epidemic.  
Free Mill Sites, either in or just without the corporate limits. No Strikes.  
Lowest Tax Rate of any Georgia County.  
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Electric Belt Line. Electric Street Cars.  
Minimum Cost of all Building Material.  
Public Day, Night and Kindergarten Schools.  
Handsome Churches and Public Library.  
A Refined and Progressive Citizenship.

### The Coming Great Manufacturing Metropolis of Georgia and the South. - - - -

ADDRESS L. H. CHAPPELL, Mayor, or  
RHODES BROWNE, Secretary  
Columbus Board of Trade,  
COLUMBUS, GA.

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In Alabama, Florida, Mississippi and Texas.  
Dry, Healthy, Fertile and Well Timbered.  
YELLOW PINE LANDS A SPECIALTY.

Apply to or address JOHNSTON & NELSON, 241 E. German Street, BALTIMORE, MD.

### THE COLUMBIA WATER POWER CO., COLUMBIA, S. C.

.....Offers for sale.....  
**UNLIMITED ELECTRIC POWER**  
In large or small units for manufacturing purposes. Columbia is in the centre of the cotton producing country. Low freight rates to all points. An ideal manufacturing location.  
GEORGE WALLACE, General Manager, Boston Office, 53 State St., Room 608.  
WM. C. HAWKINS, Managing Engineer, Columbia, S. C.

#### FOR SALE.

#### Complete Knitting Mill Machinery Outfit.

Capacity about 400 dozen a week of misses and ladies ribbed hose and men's half hose. All necessary dyeing machinery, building, etc. Located in a growing town with good railroad facilities, cheap labor, fuel, etc. Will be sold privately, or if not sold by May 2d, will be sold at auction that day. For further information address

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#### The Place for Factories.

Central location between extreme North and South. Climate perfect. City very healthy. Surrounded by the most productive cotton and rice plantations and truck farms. One lives cheaply in Wilmington and consequently labor is cheap also. Our city is the best situated on the South Atlantic Coast for factories of all descriptions, it has the lowest freight rates in the entire timber and cotton belt. Our cotton mill runs day and night, and new factories are exempt from taxation for ten years.

For further information write to the  
SECRETARY of Chamber of Commerce.

#### VALUABLE COTTON MILL FOR SALE.

The undersigned offers for sale the  
ROSALIE MILLS COMPANY'S PROPERTY  
at Natchez, Miss.,  
including buildings, tenements and machinery.  
Production 3000 pounds per day.  
Machinery of latest design and in first-class order.  
Address for particulars and terms

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### A Good Chance for a Cotton Factory.

30 acres with ample buildings, one 100-horse-power steam engine and boiler. The above property is all new and is known as the Shreveport Fair Grounds. Address

E. M. SMITH, Shreveport, La.

#### IMPROVED WATER POWER

for COTTON MILL in Central North Carolina  
FOR SALE. Address E. J. HOLT, Smithfield, N. C.

### Horse Power for Sale or Lease.

Manufacturers who are contemplating removing their plant or establishing a branch factory are invited to investigate the superior advantages possessed by the

### Roanoke Navigation & Water Power Co.

The third largest power in the United States, situated at WELDON, N. C., at the junction of the Seaboard Air Line and Atlantic Coast Line.

2000 HORSE POWER NOW READY for immediate use and capable of development to almost any extent, situated at the head of navigation of Roanoke River and junction of Atlantic Coast Line and Seaboard Air Line, INSURING FIRST-CLASS SHIPPING FACILITIES TO ALL POINTS AND LOW FREIGHT RATES. Absolutely free from interference by high water. Good manufacturing sites for various industries are available. 2,000,000 brick on hand and a yard sufficiently large to supply any demand. Weldon is in the centre of the RICHEST COTTON LAND IN THE SOUTH. 200,000 BALES COTTON BEING PRODUCED ANNUALLY.

This section is RICH in TIMBER and WOOD for manufacturing purposes, as well as for making acetate of lime of potash. Boats using 3½ feet water can go up the river from our power site for 30 miles, developing a valuable timber country that has not been penetrated. FOR THE ESTABLISHMENT OF AN ICE FACTORY no better location can be found, having a territory of a radius of 50 miles, containing a population of 400,000.

LABOR is INTELLIGENT, ABUNDANT and CHEAP. ALL DESIRABLE and NEEDED ADVANTAGES.

Our power can be bought or leased at reasonable rates. Will take pleasure in answering all requests for detailed information. Address

Roanoke Navigation & Water Power Co.

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A practical cotton manufacturer would buy one-half interest in a cotton cloth or yarn mill of five to ten thousand spindles. Or would arrange with a company having a good mill with latest make of machinery who are in need of financial assistance to loan the amount needed, interest and security being satisfactory, and take management of mill during time of loan.

Address A. B. C., care of this paper, giving full description of property; also price.

State make of machinery and how long in use.

### RADFORD, Virginia.

Parties desiring to start new enterprises or change location, are invited to investigate Radford, Va. Good climate, water and drainage, elevation, 1800 feet. On Norfolk & Western Ry., at junction of Columbus, O., and Pocahontas Coal Fields divisions, as well as Southern connection via Knoxville, Tenn. In midst of fine agricultural country and 25 miles from ore fields. Population, 4000, churches, public and private schools, electric light and car line. Ice plant and other manufactures.

Responsible parties are offered inducements, including no city taxes for five years. Address

G. T. KEARSLEY,

Secretary Board of Trade,  
RADFORD, VA.

For Sale.-COTTON MILL  
Situated on Shoal Creek, in Lawrence County, Tenn., four miles from Lawrenceburg, Tenn., on the Nashville and Florence Railroad. The Mill is run by water with a fourteen foot fall. There is about 2000 acres of land, 1700 well timbered, connected with the Mill property, which can be bought at a bargain. Also 49 acres of rich land on edge of corporate limits of Nashville, Tenn., suitable for Market Garden, there is a two-story brick house in good repair on premises. For further description address

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334 W. Main Street, LOUISVILLE, KY.

### Mill Wanted.

150 bbl. mill wanted at Rutherford, Tenn. In centre of fine wheat country. Practically no competition. Liberal bonus to right parties. Address

F. A. KENNEDY, Sec'y,  
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A LARGE Steamship Co. of Northern Europe having lines in America is desirous of expanding the business of these lines by interesting a limited amount of American capital, dividends for the past twenty years have averaged over 8%. Address for information STEAMSHIP, care Manufacturers' Record.

### FOR SALE.

One of my clients who desires to give to his bank his entire attention, which is now divided between banking and cotton-oil manufacture, wishes to sell

#### A 25-Ton Cotton Oil Mill

new, well located, latest and most improved machinery, Modern Gin and Equipment; also Fertilizer Plant; everything in first-class order; rate of insurance 1½ per cent. Address

EDWIN LEHMAN JOHNSON,  
FORT HILL, S. C.

### Cotton Machinery

#### FOR SALE.

Apply New York Office, 18 Walker Street,  
or at Mills, Paterson, N. J.

### Plant of 40,000 Spindles Being Sold.

Carding, Spinning, Winding and Weaving Machinery. All in excellent condition.

Prices Low. Send for Complete List.

#### ALSO

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Robt. Franklin Adams.

### The Following Patent Rights on a Valuable Patent Are Offered For Sale:

The entire territory west of the Mississippi River—sixteen States. We offer to sell absolutely all patent rights in those States. We offer to sell to steam boiler manufacturers right to make and put our grate in all new boilers sold by them in any territory of the United States. We also offer to sell one-fourth interest in the invention in patents applied for in England, Canada, Mexico and France. Would sell entire interest in France. The invention is an Improved Sectional Grate Bar, and its practicability and superiority have been assured. The Grate has been tested and gives entire satisfaction, being a great saver of fuel. Salesmen wanted on commission for entire United States, Western territory included, until patent right is sold. For further particulars apply to

EARL & WILSON, Box 324, Gastonia, N. C.  
P. S.—We are now ready to supply these grates to steam power users and others. Correspondence solicited.

PARTY with suitable buildings, power, and some capital, wishes to associate experienced parties with machinery in Textile or Hosiery manufacture. Desirable location; Piedmont Section, Va. Plenty of labor. Address **PIEDMONT**, care Manufacturers' Record, Baltimore, Md.

### If You Want to Buy

TOOLS,

MACHINERY,

MILL SUPPLIES,

Anything used by a manufacturer, builder, miner or contractor, notify the

MANUFACTURERS' RECORD,

Baltimore, Md., and your wants will be placed before hundreds of manufacturers who will send you their catalogue and prices. It costs you nothing.

### FOR SALE.

Standard Gauge 36-ton Baldwin Locomotive in excellent condition. Cylinders 16x24 inches diameter. Eight-wheel tender; 2000 gallons capacity, with sloping back. For terms address

BILTMORE ESTATE, Biltmore, N. C.

#### WANTED.

### One Second-Hand Shay Locomotive

for logging railway; 30-inch gauge or wider. Name price, present location and freight rate to New Orleans, La. Fully describe same, state its present condition and say how long used. If possible, send cut. Address: HAV, care Manufacturers' Record.



## ROBERT WARE GRASTY, Attorney and Counsellor-at-Law, EQUITABLE BUILDING, ATLANTA, GA.

General law practice. Collections, loans, money invested, options secured and information furnished concerning Southern properties of all kinds.

## Corporation Laws of West Virginia Are the Best.

Charter is good in any state, no liability, signers furnished saving you \$40, consultation free.

INTER-STATE LAW ASSOCIATION,  
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## Incorporate Your Business.

West Virginia Laws Most Liberal.  
No Personal Liability. Non-Assessable Stock.  
Plan mailed on application.  
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ESTABLISHED 1879.  
J. ANDERSEN JUN & CO.  
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COPENHAGEN, DENMARK,  
Agency and Commission Merchant.  
Cash advanced to any amount on consignments.  
First-class American references.

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Single Span Railroad Track Bridge, 150 feet long, built by Cofrofe & Saylor in 1879; first-class condition to put up elsewhere. Address

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## NOTICE.

We mine, manufacture, buy and sell all kinds of mineral paints, dry colors, minerals and clays. ALPHA PAINT AND MINERAL CO., 338 Bourse Building, Philadelphia, Pa.

## Agency—Export.

Gentleman having ten years experience in export commission trade, conversant with Spanish, French, German and foreign market requirements, would represent manufacturers to foreign trade, or take charge of export department for A. firm; is competent to act as resident buyer. Address "DONALD," Box 21, 1401 Third avenue, New York.

## AGENTS WANTED—To Sell the "Battle Ax" Hay Press.

Latest invention, Automatic, Ball Bearing, Compound Leverage, Self Contained. No gear wheels or springs. Full circle, Simple in construction, efficient in service. Write, prices, discounts.

ALABAMA FOUNDRY & MACHINE WORKS,  
NEW DECATUR, ALA.

## WANTED.

## Machinery to Manufacture

We have a thoroughly equipped Machine shop, Carpenter Shop and Foundry, and can do all classes of Machine Work very reasonable. Try us.

SOUTHERN FOUNDRY & MACHINE WORKS,  
FREDERICKSBURG, VA.

For Sale to Close Out Business.

## 26,000 ACRES OF LAND,

From 4 to 16 miles from Summerville, S. C. a noted health resort, containing long and short leaf pine, oak, hickory, ash, cypress, etc. Contains excellent farming and pasture land, and is convertible into a game preserve. Also second-hand machinery in good order.

A. W. TAYLOR LAND & LUMBER CO.,  
SUMMERVILLE, S. C.

## TIMBER LAND.

21,000 Acres Virgin Forest in best timbered section of West Virginia. Experts measured off several one acre blocks on N., S., E. and W. portions of this tract, and then measured the timber thereon, using Scribner's Lumber and Log Book. Best acre measured 80,027 feet B. M.; thinnest acre, 19,964 feet; general average, 39,471 feet per acre, divided as follows, viz: Hemlock, 19,016 feet; Spruce, 11,358 feet; Cherry, 3,778 feet; Maple, 2,077 feet; Birch, 1,212 feet; Sugar, 948 feet; Ash, 794 feet; Beech, 518 feet; and Cucumber, 270 feet. Total amount of merchantable timber on this tract (approximated)

863,962,000 FEET.

The Title is Guaranteed to be Absolutely Perfect. Price and terms very reasonable. Sworn statement of the experts and detailed information sent upon application to THE SOUTHERN REAL ESTATE EXCHANGE, Clarkburg, W. Va.

## FOR SALE.

7000 Acres of Yellow Pine Timber Lands, on the Georgia Coast.  
Address W. A. WILLCOX, Darien, Ga.

## For Sale at 50 Cents on the Dollar.

Complete Modern Fertilizer Plant.  
The Buildings, which were erected specially for a Fertilizer Plant, are new and conveniently arranged. The

MACHINERY IS NEW and was constructed by well known designers and manufacturers of fertilizer appliances. It is in every particular of the

LATEST AND MOST IMPROVED TYPE. The Plant is arranged for both, Acid Phosphate and Ammoniated Goods, and is in full running order. Now ready to be put at work at its full capacity. The Plant has a

CAPACITY OF ABOUT 10,000 TONS per year in complete goods. The Territory within the scope of this Plant includes Delaware, Maryland, Virginia, New Jersey and Pennsylvania. About 5000 tons are consumed yearly in the territory immediately adjacent to the works.

TRANSPORTATION FACILITIES exceptionally good, both rail and water communication is convenient. The labor cost is low. This Modern Plant may be purchased for a comparatively small investment. We shall be pleased to open correspondence with any one interested in the trade.

WALKER & ELLIOTT,  
WILMINGTON, DELAWARE, U. S. A.

## For Sale--MILL and BOOM

On Caney Fork River, White County, Tennessee, on the N. C. & St. L.

Mill capacity, 25,000 feet. Abundant Poplar and Oak on river at \$2 to \$3 per thousand stumpage. Falls below mill give plant control of all timber on upper river. Will sell cheap. Address

B. E. J., care Southern Lumberman, Nashville, Tenn.

## RARE OPPORTUNITY. FOR SALE.

An Up-to-Date Foundry & Machine Shop,  
AT ROME, GA.

Owing to the death of the owner, and the consequent necessity of winding up the estate for distribution, the J. A. George Foundry and Machine Works, of twenty years' standing, with an established and remunerative patronage, are offered for sale at a bargain. The business is now being run successfully by the administrator of the estate.

Address for price, terms and particulars.  
SAM'L FUNKHOUSER, Administrator,  
ROME, GA.

## WANTED.

## A First-Class Canning, Pickling and Preserving Factory.

Unlimited supply of raw material.  
Ten thousand acres in fruits and gardens.  
Center of Gulf Coast Fruit Belt.  
Located midway between Houston and Galveston, Texas.  
A fine manufacturing point.  
Best shipping facilities.  
Correspondence solicited.  
Address

W. B. BAIR, Sec'y  
Alvin Business League,  
ALVIN, TEXAS.

## FOR SALE. Mineral, Farming AND Timber LANDS.

Can Supply following:

Asbestos Lands.	Antimony.
Baryta.	Black Cypress Poles.
Beauzite Lands.	Cement Gravel.
Chrome Iron.	Corundum Lands.
Coal Lands.	Cotton Lands.
Copper Lands.	Cedar Lands.
Cypress Lands.	Farming Lands.
Fire Clay.	Fuller's Earth.
Granite Quarry.	Gold Mines.
Graphite Deposit.	Hemlock Timber Lands.
Iron Lands.	Juniper Lands.
Kaolin Mines.	Land for Colonies.
Mica Lands.	Manganese Lands.
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Phosphates, Tennessee.	Phosphates, S. C.
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Pasturage Lands.	Poplar Lands.
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Sea Islands.	Shooting Lands.
Tin Mine.	Talc Deposits.
Truck Farms.	Timber Lands.
Tie Lands.	Tan Bark Lands.
White Pine Lands.	White Oak Lands.
Walnut Timber.	

E. WILLIS,  
CHARLESTON, S. C.

## BY SPECIAL COMMISSIONER.

## SPECIAL COMMISSIONER'S SALE.

## JUDAH HART VS. MUNICIPAL ICE MANUFACTURING COMPANY.

IN THE MATTER OF THE INTERVENTION OF GEO. S. DODDS.  
No. 12,626—In the United States Circuit Court for the Eastern District of Louisiana—New Orleans Division.

In pursuance of a decree rendered by the Hon. Don A. Pardee, Judge of the United States Circuit Court for the Eastern District of Louisiana, New Orleans Division, in the above entitled and numbered cause, and of an order granted by said court and to me directed, I will sell at public outcry, to the last and highest bidder, for cash, without appraisal, on the premises, corner of South Water and Market streets, in the city of New Orleans, Louisiana, on SATURDAY, the 7th day of May, 1898, beginning at 11 o'clock A. M., the following described property, to-wit:

THE LANDS AND IMPROVEMENTS THEREON, and the rights, ways, privileges, servitudes and advantages thereunto appertaining and belonging, and particularly described in an act of mortgage passed before Jefferson C. Wenck, notary public, in the city of New Orleans, Louisiana, on the 30th day of January, 1892, as follows, to-wit:

I. SEVEN CERTAIN BATTURE LOTS OF GROUND, together with the buildings and improvements thereon, and the rights, ways, privileges, servitudes and advantages thereunto appertaining and belonging, situate in the First district of this city, in the square bounded by Water, Market, New Levee and St. James streets, forming together a portion of ground having an aggregate measurement as follows:

A front on Water street of one hundred and seventy-seven feet ten inches; a depth and front on Market street, whereof it forms the corner, of one hundred and seventy-two feet seven inches and six lines; thence along the rear line perpendicular to Market street and parallel with New Levee street one hundred and fifty-nine feet six inches; and on the other depth line running up to Water street ninety-four feet one inch and three lines, according to a sketch made at the request of McCloskey, Higley & Co., on the 30th October, 1870, by J. A. D'Hemecourt, deputy city surveyor; the said seven lots are also designated by the numbers "seven" to "thirteen," inclusive, of square No. "34 A," on a plan made by Louis Pille, late city surveyor, on the 29th of June, 1867, deposited in the office of Henry C. Dibble, late notary, and are described as follows, to-wit: SEVEN CERTAIN LOTS OF GROUND, together with the buildings and improvements thereon, and the rights, ways, privileges, servitudes and advantages thereunto appertaining and belonging, situate on the corner of the First district of this city, designated by the Nos. "seven" to "thirteen," inclusive, of square "34 A," bounded by Peters (late New Levee), Water, Market and St. James streets, on a plan drawn by Louis H. Pille, late city surveyor, dated June 29, 1867, and deposited in the office of Henry C. Dibble, late notary, as plan No. 19, according to said plan said lots measure as follows, to-wit:

Lot No. "seven" measures twenty-nine feet seven inches and six lines front on Water street, twenty-six feet seven inches in width in the rear, by a depth of ninety-four feet one inch and three lines on the side line dividing it from lot No. "six," and one hundred and seven feet two inches and three lines on the other side line dividing it from lot No. "eight;" lot No. "eight" measures twenty-nine feet seven inches and five lines front on Water street, twenty-six feet seven inches in width in the rear, by a depth of one hundred and seven feet two inches and three lines on the side line dividing it from lot No. "seven," and one hundred and twenty feet three inches and four lines on the other side line dividing it from lot No. "nine;" lot No. "nine" measures twenty-nine feet seven inches and five lines front on Water street, twenty-six feet seven inches in width in the rear, by a depth of one hundred and nineteen feet five inches and five lines on the side line dividing it from lot No. "eight," and one hundred and six feet four inches and four lines on the other side line dividing it from lot No. "ten;" lot No. "ten" measures twenty-nine feet seven inches and five lines front on Water street, twenty-six feet seven inches in width in the rear, by a depth of one hundred and nineteen feet five inches and five lines on the side line dividing it from lot No. "nine," and one hundred and thirty-two feet six inches and five lines on the other side line dividing it from lot No. "eleven;" lot No. "eleven" measures twenty-nine feet seven inches and five lines front on Water street, twenty-six feet seven inches in width in the rear, by a depth of one hundred and nineteen feet five inches and five lines on the side line dividing it from lot No. "ten," and one hundred and thirty-two feet six inches and five lines on the other side line dividing it from lot No. "twelve;" lot No. "twelve" forms the corner of Water and Market streets, and measures twenty-nine feet seven inches and five lines front on Water street, twenty-six feet seven inches in width in the rear, by a depth of one hundred and thirty-two feet six inches and five lines on the side line dividing it from lot No. "eleven," and a depth and front on Market street of one hundred and forty-five feet seven inches and six lines, and lot No. "thirteen" measures twenty-seven feet front on Market street, the same width in the rear, by one hundred and six feet four inches in depth between parallel lines; also all and singular the engines, boilers, machinery and all other appurtenances of the said ice manufacturing belonging to said company, and on said premises, together with the dependencies and accessories thereof, and comprising the entire plant of said company.

Said sale will be made free and clear of all liens and encumbrances set up in this cause, and especially free from all liens and encumbrances resulting from the mortgage executed on the 30th day of January, 1892, before Jefferson C. Wenck, notary public, and from all claims of any holder or holders of the bonds and coupons secured by said

mortgage, and free from all liens and encumbrances of any subsequent mortgages or liens or privileges, but subject to the taxes on the property for the year in which said sale is made, which shall be assumed by the purchaser.

For further particulars see the decree on file in the United States Circuit Clerk's office, at New Orleans, La.  
ALCEE LeBLANC,  
Special Commissioner.

## FOR SALE.

## Up-to-date Wheel Factory

in one of the best Southern cities. 3 railroads. Capacity 150 sets of wheels per day. 10,000 finished spokes per day. Best of material right at door at cord-wood prices. Address

P. O. BOX L,  
Meridian, Miss.

## Commissioner's Sale

of Valuable Manufacturing Property,  
at RICHMOND, VA.

The works of Talbott & Sons Co., with the plant and good will, which have been in operation more than 50 years, well equipped for the manufacture of engines, boilers, saw mills and machinery generally. To be sold at auction on April 28, 1898. The works are located on Cary Street, and cover about two acres of ground. For full particulars apply to

N. W. BOWE,  
Real Estate Auctioneer,  
RICHMOND, VA.

## FOR SALE CHEAP.

## MILL PROPERTY

CONSISTING OF

Planing Mill Machinery and Manufacturing Plant, Double Story Building covering 5 city lots, located in heart of city on two main railroad lines.

Building admirably equipped for wood manufacturing purposes, all being in perfect order and ready for operation. Abundance and low price of raw material, together with low freight rates to jobbing centers, makes this an unexcelled point for wood manufacturing plant. Detailed particulars furnished on request.

BROBSTON, FENDIG & CO.  
BRUNSWICK, GA.

## FORCLOSURE SALE

OF THE

Property and Franchise of  
Standard Cotton Mills  
of Rock Hill, South  
Carolina.

Under and by virtue of the decree of the Circuit Court of the United States, for the District of South Carolina, filed the fourth day of April A. D. 1898, in the cases of A. Klipstein & Company vs. Standard Cotton Mills, et al, and Central Trust Company of New York vs. Standard Cotton Mills, et al, I, Julius H. Heyward, Standing Master of said court, will sell at public auction upon the premises of said defendant corporation, in the city of Rock Hill, in the county of York and State of South Carolina, on the tenth day of May, 1898, at 12 o'clock M., "the entire property and estate of The Standard Cotton Mills, being the real estate of said corporation, embracing twenty-seven acres of land, more or less, situated on the line of the Ohio River and Charleston Railway, in the city of Rock Hill and county of York and State of South Carolina, adjoining lands now or formerly of W. B. Wilson and A. K. Smith, Mrs. Margaret Kimbrell, I. & A. Jones, W. M. Steel, and others, including the factory and all dwellings and out-houses thereon, all the machinery in said factory, fixtures, workshops, tools and materials, and all the Corporate Rights and Franchises and Privileges of said Corporation, and any and all other property of said Corporation now in the hands of the Receiver."

TERMS—One third cash, upon the order of the court confirming the sale, and the balance on a credit of twelve months with interest from day of sale, secured by bond of the purchaser and a mortgage of the premises, property to be insured for amount of credit portion and policy assigned as additional security. Purchaser to have the privilege of paying all cash.

The upset price will be \$40,000 for said property as a whole, and no bid shall be finally accepted unless accompanied with a certified check for \$5000, which shall be forfeited in case of the purchaser failing to comply with the terms of sale. In complying with the terms of said sale any bondholder may use his bonds as cash to the extent of the dividend that he would be entitled to receive on said bond or bonds, and any party to the cause has leave to become a purchaser.

JULIUS H. HEYWARD,  
Standing Master.

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**FOR SALE.**  
One 10, 15 and 25 H. P. Double Cylinder Single Drum Hoisting Engine.

Also same size double cylinder double drum, either with or without boilers.

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**REUTER & MALLORY,**  
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## SECOND-HAND ENGINES FOR SALE CHEAP

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Builders of the American Ball Engines and Electrical Machinery,  
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## SECOND-HAND Automatic Engines and Boilers

in great variety at low prices. These engines have been all rebuilt, are practically equal to new. Send for quotations. State just what you need.

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**FOR SALE.**—1 to H. P. Poole & Hunt Engine; 3 60 H. P. Return Tubular Boilers; 2 Iron Tanks, 9 ft. dia. x 9 ft. deep; 2 Iron Tanks, 6 ft. sq. x 6 ft. deep; 300 ft. of 6 in. Cast Iron Pipe with flanges on ends; all as good as new; can be bought cheap. If in need of new or second-hand machinery of any kind write me, I can supply you. If you have machinery of any kind for sale send me a list of it, I can sell it for you.  
**JOHN F. RILEY'S MACHINE WORKS,**  
6 and 8 South Street, CHARLESTON, S. C.

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One 10, 15 and 25 H. P. Double Cylinder Single Drum Hoisting Engine; also same size Double Cylinder Double Drum, either with or without boilers.

ADDRESS  
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10 ft.	6 in.	1 1/4 in.	pipe.
62 ft.	9 in.	3 1/2 in.	pipe.
7 ft.	6 in.	4 1/2 in.	pipe.
17 ft.	6 in.	6 in.	pipe.
18 ft.	10 in.	8 in.	pipe.
4 ft.	7 in.	9 in.	pipe.
262 ft.	2 in.	10 in.	pipe.
241 ft.	4 in.	12 in.	pipe.

**SECOND-HAND PIPE.**  
100 ft. 4 in. 2 in. pipe.  
100 ft. 8 in. 3 in. pipe.  
118 ft. 8 in. 4 in. pipe.  
All in good condition. Threads protected.  
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Lathes from 12" to 48". Planers from 20" up to 60". 48", 54" and 60" Radial Drills, No. 2 Newton Milling Machine, No. 2 Screw Machine, Shapers from 6" to 30". Boilermakers' Punches, Shears, Edge Planers, Rolls, Drills, E. gins, Boilers, Pumps and Dynamos.  
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Ten tons capacity, span 45 feet 6 inches. In first-class condition.

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Electric Motors in Stock.

110 Volt—1/4, 1/2, 3/4, 1, 2, 3, 4, 5, 7 1/2, 10, 15, 20, 25, 30, 35, 60, 75 horse-power.  
220 Volt—1/4, 1/2, 3/4, 1, 1 1/2, 2, 3, 4, 5, 7 1/2, 10, 15, 20, 25, 30 horse-power.  
500 Volt—1, 2, 3, 4, 5, 7 1/2, 10, 15, 20, 30, 35, 50, 75 horse-power.  
All are of standard makes, principally Edison, Thomson-Houston, Westinghouse, Crocker-Wheeler, C. & C. and Eddy.

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**ENGINES** for Blast Furnaces, Foundries, Converters and Rolling Mills. **MILL TRAINS** (3-high), 36 in., 30 in., 20 in., 18 in., 12 in. and 6 in. **SHEARS** for Blooms, Billets, Plates, Sheets, Old Rails and Scrap. **CRANES**—Yale and Towne Pillar Crane (10-ton); Jib Cranes, Iron and Wooden. **STEAM HAMMERS**, various sizes and makes. **SQUEEZERS** (Rotary). **FLY WHEELS** and **BAND WHEELS**, various sizes, Punches, Straighteners, Roll Lathes, Riveters, Machine Shop Tools, etc., etc. **LOCOMOTIVES**, various gauges, sizes and styles.

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1 Harris Corliss Engine, 12x30; fly wheel 10 ft. diameter, 18 in. face.  
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12"x5' Reed & Prentice.  
13"x6' Ames Mfg. Co.  
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16"x6' Fitchburg, taper attached.  
17"x7' Pratt & Whitney.  
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20"x10' Putnam, compound rest.  
21"x9' Lodge-Davis, taper attachment.  
22"x10' Pond, compound rest.  
24"x12' Putnam, compound rest.  
26"x10' Fifeild, compound rest.  
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40"x20' Pond, extra heavy.  
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22"x5' Putnam. 24"x6' Lodge, Davis.  
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48"x16' Putnam.

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12" stroke crank, Gould & Eberhardt.  
15" stroke friction, Prentice.  
16" stroke crank, Gould & Eberhardt.  
24" stroke friction, Hendley.  
24" stroke crank, Gould & Eberhardt.

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Sensitive Drills, various kinds.  
20" swing Barnes, hand feed.  
21" swing Prentice, back geared.  
22" swing Barnes, back geared, automatic feed.  
26" swing Lodge-Davis, complete.  
28" swing Barnes, complete.  
32" swing Prentice, complete.

### RADIAL DRILLS.

7 1/2" swing, complete tapping attachment.  
120" swing Bement, Semi-Universal.  
110" swing, Bausch, latest.

### MILLING MACHINES.

Universal, Kemp Smith, "tool size."  
Universal, Cincinnati No. 3, back geared.  
Universal, Brainerd No. 15, "tool size."  
Plain, No. 2, Kemp Smith, latest.  
Plain, No. 12, Garvin, with arm.

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1 1/2-16 Wire Feed, Jones & Lamson, latest.  
1 1/2-16 Wire Feed, Garvin, friction head and turret feed complete.  
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Automatic Gear Cutter, 36", Gould & Eberhardt.  
Cutting Off Machines, 2 and 3 in.  
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8 3-ft. gauge Locomotives.  
1 Standard gauge Locomotive.  
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25 new 3-ft. gauge 2 1/2-yard Cars, for shovel or hand work.  
5 side and centre Unloading Plows.  
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10 Hoisting Engines.  
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Large stock of Engines, Boilers and Steam Pumps.

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500 tons 56 lb. Relaying Rails with Splices.  
1000 tons new Steel Rails, 48 lbs., with Splices and Spikes.  
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Lot of narrow gauge engines, flat and box cars, at Galveston, Texas. Call or write.

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CINCINNATI, OHIO, or CHICAGO, ILL.  
We are always in the market to buy relaying rails and scrap iron of all kinds for cash.

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One Standard gauge 22-ton Porter, saddle tank, switching locomotive, cylinders 12x18; 1 standard gauge 15-ton Baldwin-Forney type, 10x14; 1 3-ft. gauge, 12-ton Shay geared locomotive; 1 3-ft. gauge, saddle tank, 9-ton Porter, cylinders 8x12; 1 3-ft. gauge, 13-ton saddle tank Porter, cylinders 10x14; 1 3 ft. Baldwin Mogul, 18-ton, cylinders 12x18; 100 tons 30-lb. iron rails in Tennessee; 250 tons 25 and 30-lb. rails in Louisiana; 20 second-hand logging cars, 3-ft. gauge. Write for prices.

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Wanted—Relay Rails and Scrap Iron for Cash.

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Several Shay Patent  
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Also other logging locomotives and cars

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All of the Lake Street Elevated R. R. Engines

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Weight, 28 to 30 tons. Twenty tons on Drivers. Diameter of Drivers 44 inches.

Four-Wheel Steel Tired Truck under tank.

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Tank Capacity, 750 Gallons.

May be Increased to 1000 or 1750 Gallons. Vacuum Brakes.

A large line of 8 and 10-wheel road engines; also 4 and 6-wheel connected switchers; also narrow gauge equipment.

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A number of Second-hand  
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for 30 lb. rail, (3 ft. gauge of track), including 4 ft. or 6 ft. Frog, Ground Lever, Switch Points and Connecting Rods.

New and Relaying Steel Rails  
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They have been discontinued from service because of the introduction of electricity and the replacement by heavier locomotives; therefore, not offered for sale on account of their inefficiency.

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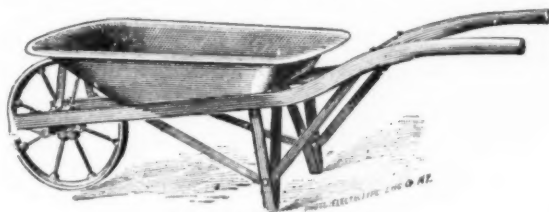
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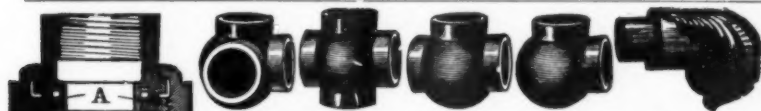
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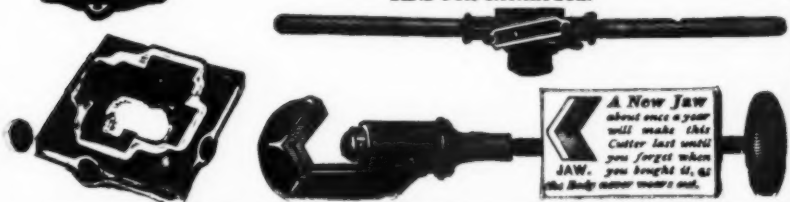
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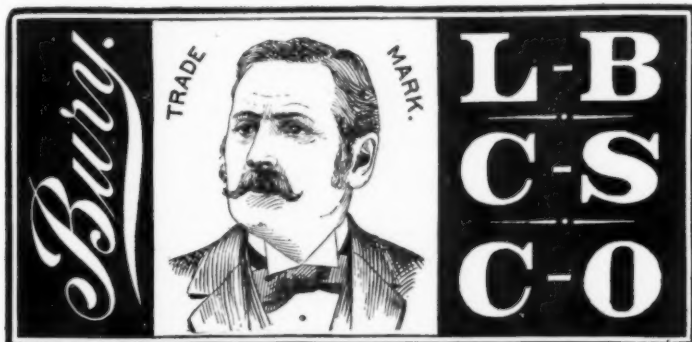
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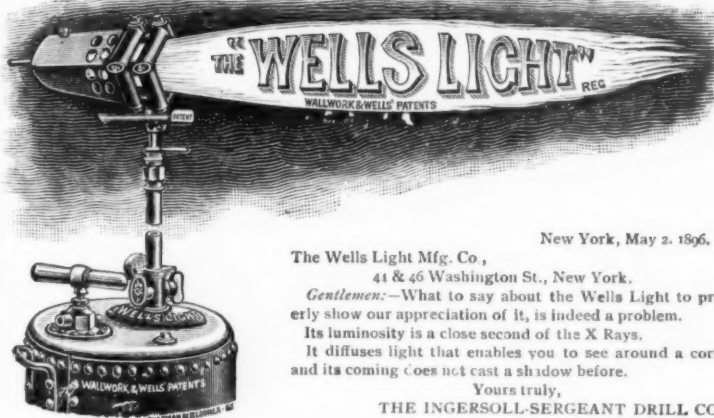
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Its luminosity is a close second of the X Rays.

It diffuses light that enables you to see around a corner and its coming does not cast a shadow before.

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800 to 2,000 Candle Power from Kerosene Oil.

PORTABLE. SELF-CONTAINED. AUTOMATIC.  
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Especially adapted for Contractors, Quarries,  
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400 Railroads and over 500 Contractors now use the  
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EDWARD ROBINSON, Sole Proprietor.

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**HOISTING ENGINES**  
Are built to Gauge on the Duplicate Part System.  
QUICK DELIVERY ASSURED.  
**STANDARD** FOR QUALITY AND DUTY.  
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Metallized Loose Pulley Bushes require no oil or other lubricant, either at the start or occasionally afterwards. Will run perfectly dry for years.

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TRAVELING DERRICK CARS,  
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Celebrated Crowl's Patent.  
CORRUGATED IRON  
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Eave Trough, Conductor Pipe and Roof Paints. WRITE FOR PRICES.

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HIGH CLASS WORK ONLY  
FIGURE AND MEMORIAL WINDOWS  
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CAPITALS, BRACKETS,  
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SOLE AGTS. FOR CHAS. EMMEL  
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Estimates Furnished in any part of the Country.

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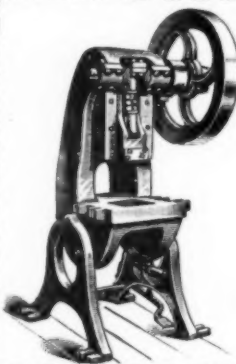
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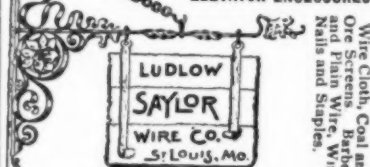
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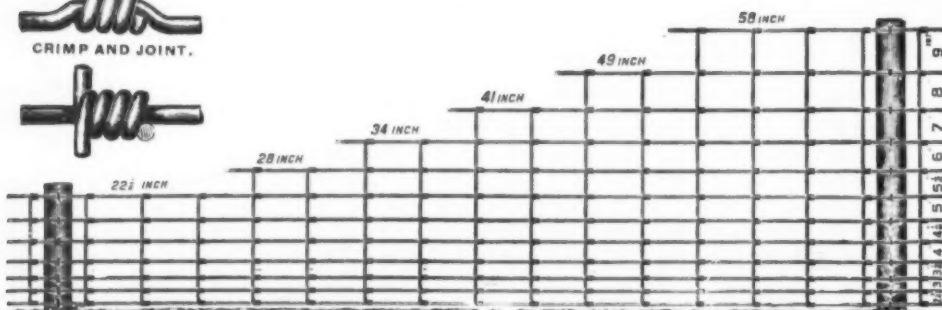
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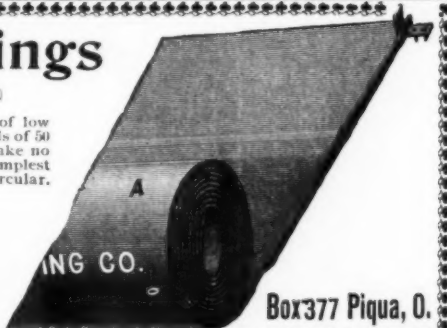
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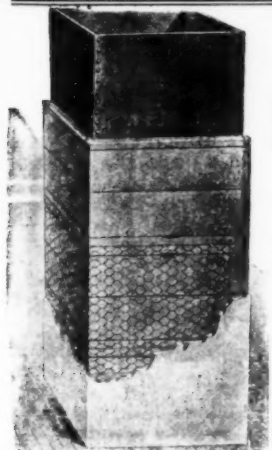
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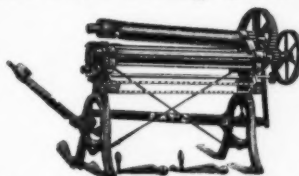
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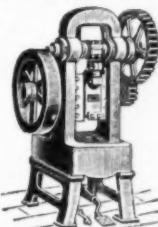
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TO BUILDINGS  
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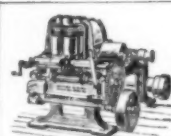


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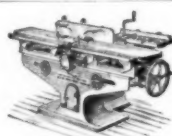
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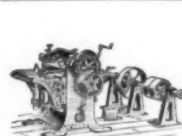
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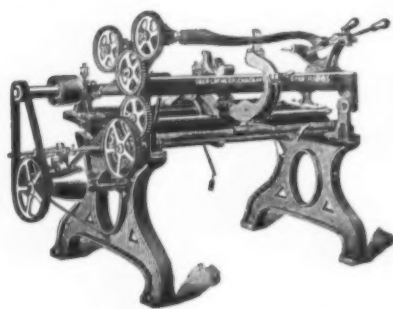


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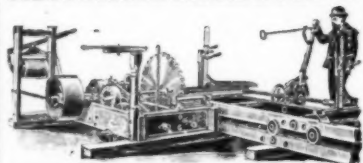
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FEED, Most Accurate  
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PORTABLE, STATIONARY & TRACTION  
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If you wish to keep posted on the progress of the South, read the Manufacturers' Record. Price \$4.00 a year.





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Lathes for turning handles for Brooms, Mops,  
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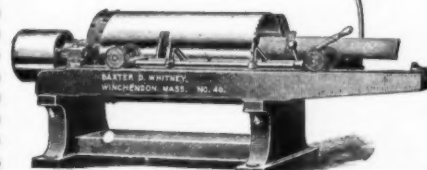
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[Improved Law's Patent Heading and  
Shingle Sawing Machine]

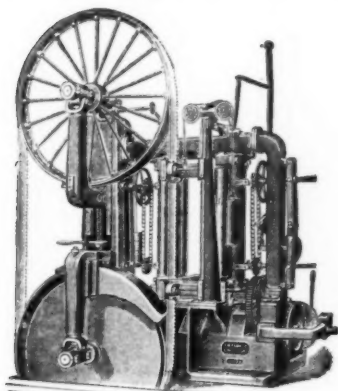
## 10,000 OIL-BARREL STAVES

EVERY 10 HOURS.

See Circulars.



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No. 5½ Band Re-Saw.  
Re-Saws 36 ins. wide, 20 ins. thick,  
or to the centre of 16 ins.  
Sixty inch wheels.  
Six-inch blade.

## The Use of a Band Re-Saw

in connection with your Band Mill  
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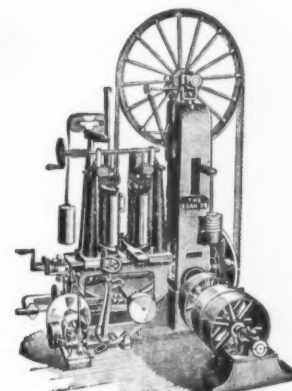
Many of the largest and finest mills in the South  
are using our No. 5½ Re-Saw for that purpose,  
and the box factories use our No. 9.

Each machine is the Best of its kind for the purpose intended,  
practical operators testifying to that effect.

SHALL WE DESCRIBE THEM FURTHER TO YOU?

## THE EGAN COMPANY,

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Re-Saws 30 ins. wide, 13 ins. thick,  
or to the centre of 10 ins.  
Fifty-inch wheels.  
Five-inch blade.

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MADE FROM FINEST  
SELECTED STEEL.

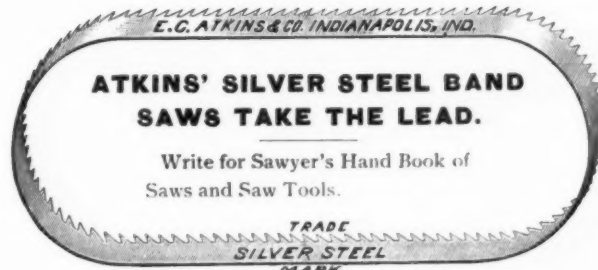
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CIRCULAR, BAND, GANG, DRAG, CROSS-CUT, HAND AND SAWS  
OF EVERY DESCRIPTION. CYLINDER SAWS RE-STEELLED.

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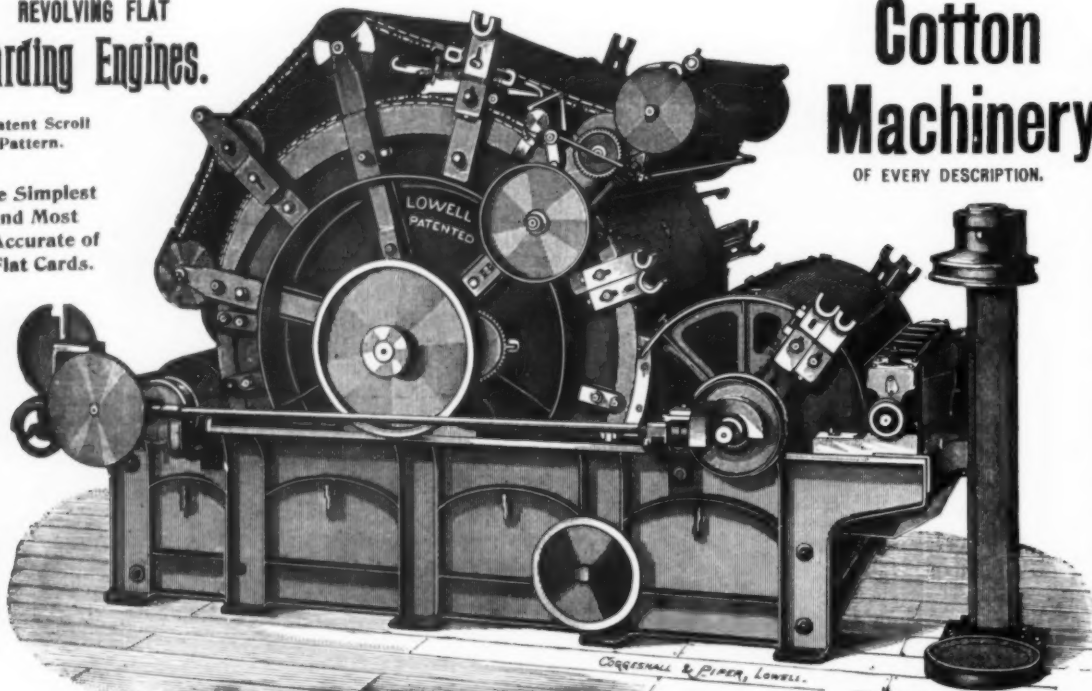


# LOWELL MACHINE SHOP, LOWELL, MASS.

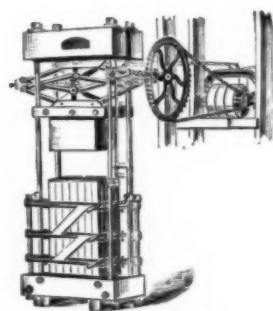
REVOLVING FLAT  
Carding Engines.

Patent Scroll  
Pattern.

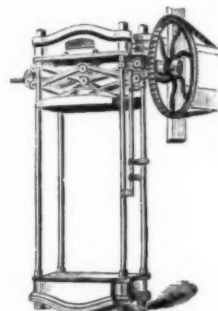
The Simplest  
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Accurate of  
Flat Cards.



**Cotton  
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OF EVERY DESCRIPTION.



Knuckle-Joint  
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Knuckle-Joint  
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Hydraulic  
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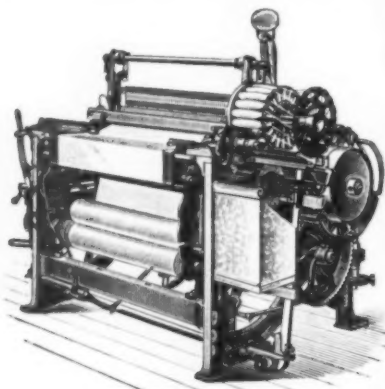
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public at the present time,  
especially those who have  
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thus augmenting their own  
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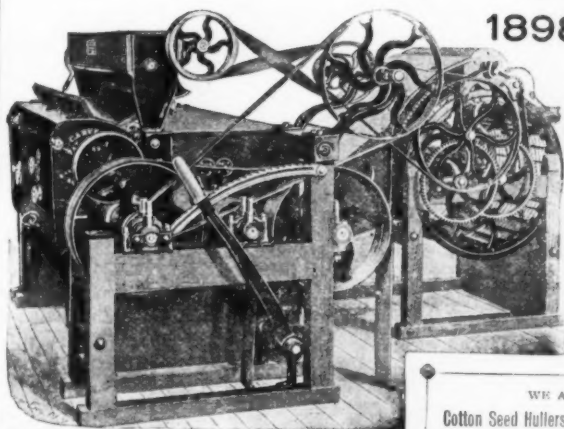
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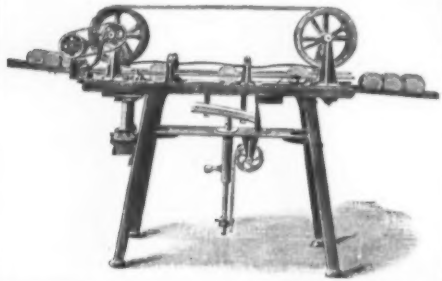
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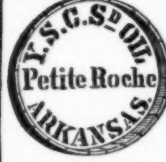
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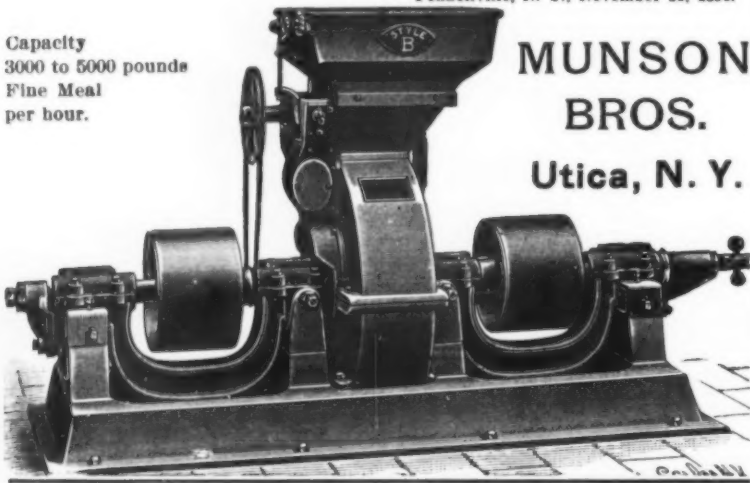
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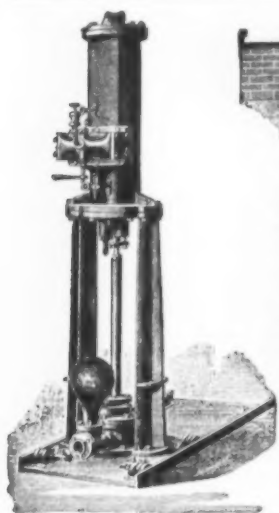
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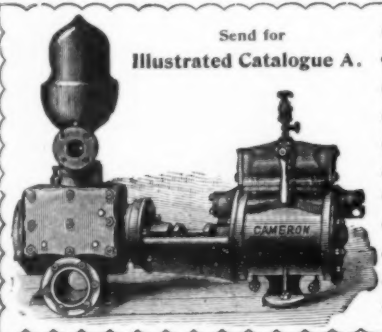


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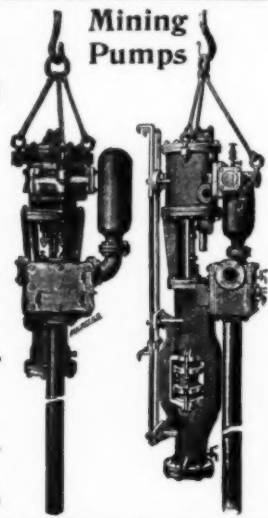
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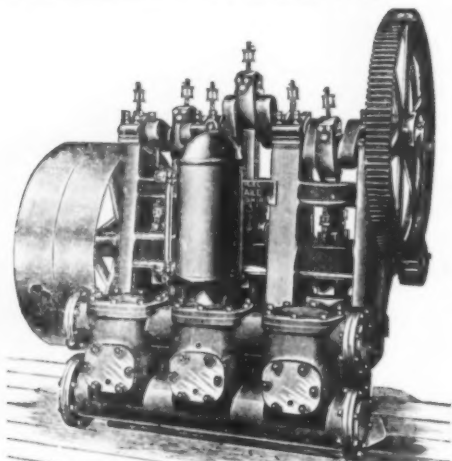
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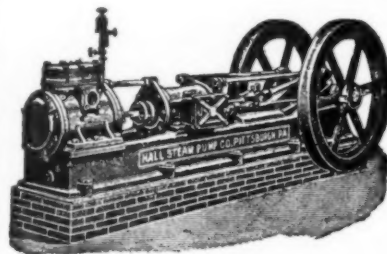
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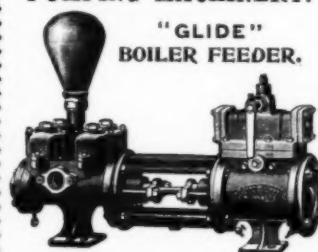
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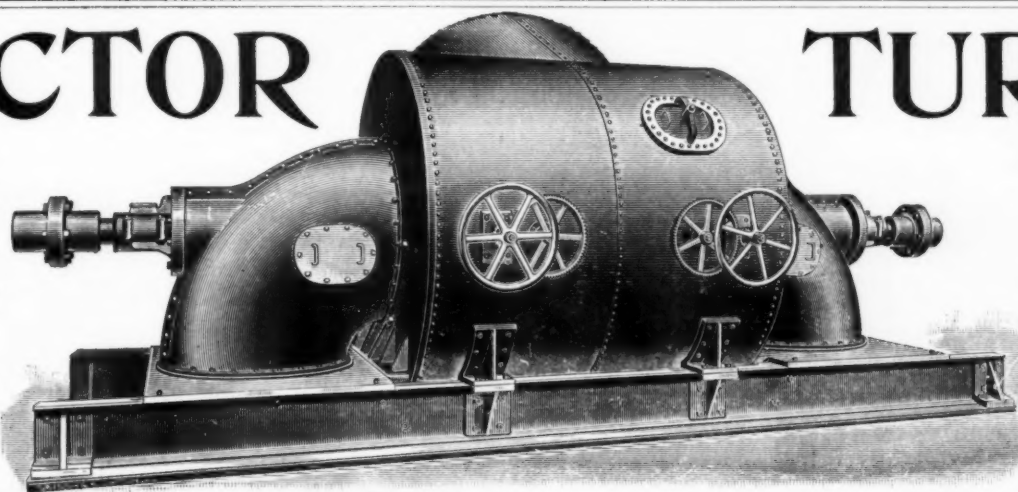
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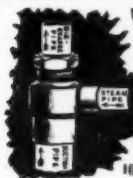
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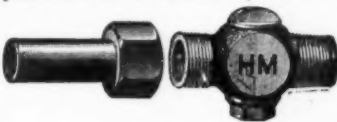
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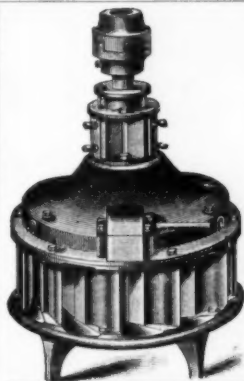
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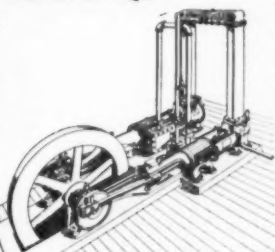
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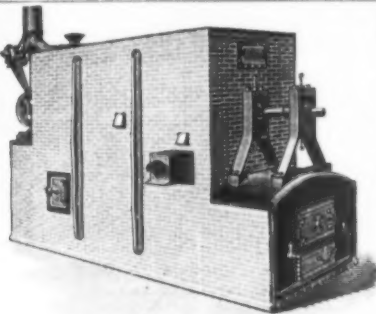
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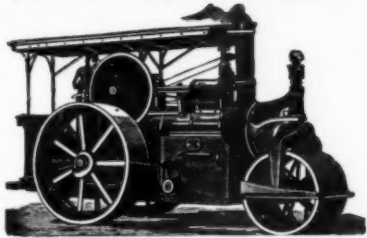
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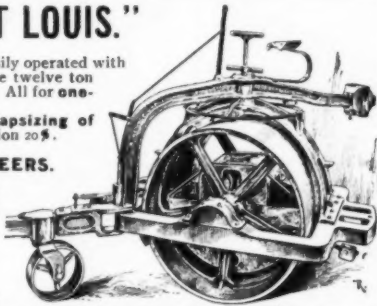
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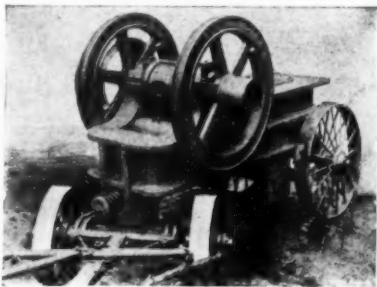


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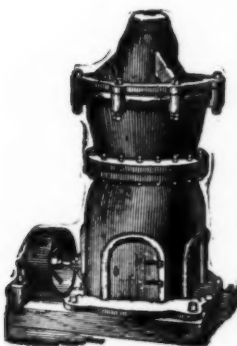
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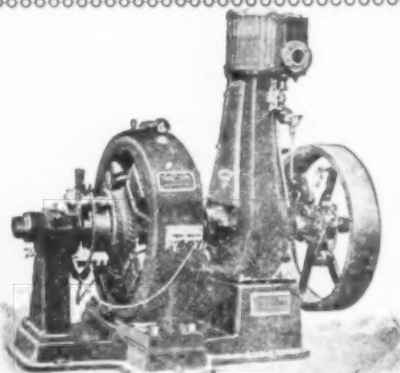
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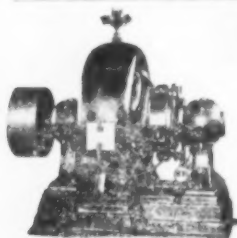


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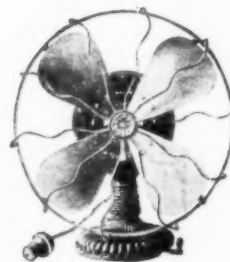
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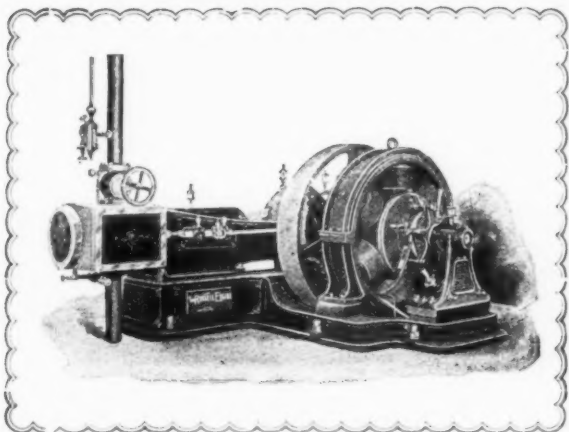
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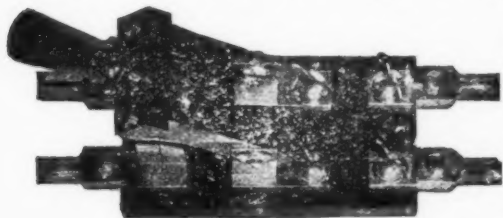
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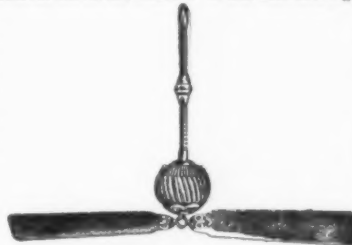
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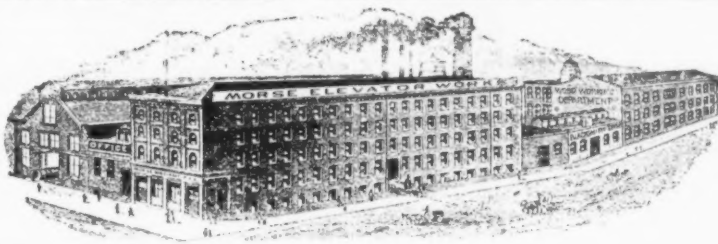
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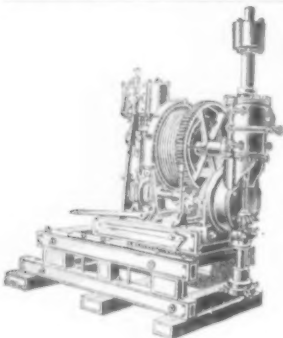
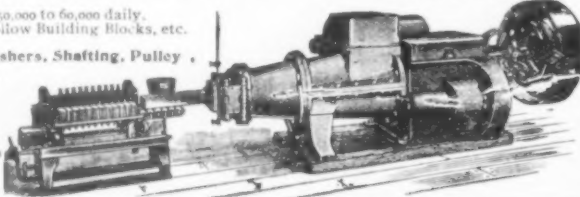
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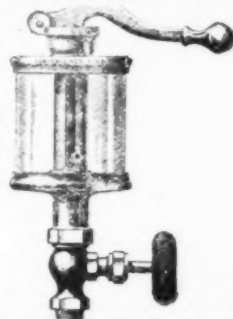
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c.

''

Y.  
c.



RRK.

ttle,  
turn

THRS.